

Land Use Plan Areas East of I-85



Rowan County, North Carolina

Prepared by the Rowan County
Department of Planning & Development

Adopted January 17, 2012





**LAND USE PLAN
AREAS EAST OF I-85
ROWAN COUNTY
NORTH CAROLINA**

Prepared for
Rowan County Board of Commissioners

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Date Adopted
January 17, 2012

Prepared by
Rowan County Department of Planning & Development





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INTRODUCTION

On March 7, 2011, the Rowan County Board of Commissioners directed Planning Staff to prepare a proposal for conducting a land use study for the eastern portion of Rowan County not contained in the Land Use Plan for the Areas West of I-85. Based on the proposal, the majority of the Commission authorized the Planning Board and Staff to initiate an abbreviated study process on May 2, 2011. The rationale for undertaking the study was two-fold:

1. *Provide ‘balance’ with the western area plan adopted by the Commission in April 2009; and,*
2. *Satisfy the Federal Highway Administration and NC DOT requirement for a land use plan as it relates to a future I-85 interchange at Old Beatty Ford Road*

Planning Board Chairman Mac Butner assigned Committee A of the Planning Board the task of managing study development. Committee A was chaired by Jack Fisher and committee members included: Bill Brown, Greg Edds, Craig Pierce and Larry Wright. The Committee met on the following dates and considered these land use topics or tasks relevant to the study process:

Date	Topics
June 9, 2011	Population Housing Adjacent Jurisdictional Impacts Historical Elements
July 14, 2011	Economic Base Land Use Area Map Development
August 16, 2011	Community & Recreation Facilities Schools Transportation Natural Environment
August 30, 2011	Finalize DRAFT Recommendations for Workshops
October 24, 2011	Review Draft Land Use Plan (DLUP)
October 31, 2011	Recommendation to approve DLUP (5-0)
November 22, 2011	Planning Board Workshop

Workshops intended to solicit public comment regarding the draft recommendations were held at the following locations within the study area:

September 20, 2011	East Rowan High School
September 22, 2011	North Rowan High School
September 27, 2011	Jesse Carson High School

Comments and suggestions received from the workshops were provided to the Committee for consideration and discussion prior to their inclusion in a final draft land use study document recommended by Committee A. The final draft document was forwarded to the Planning Board for consideration and discussion at a series of workshops prior to conducting a courtesy hearing on November 28, 2011.



BACKGROUND INFORMATION

With the guidance of Committee A, Planning Staff were able to identify and research topics of key interest and importance to the planning process in the eastern study area. The topics are depicted in maps, tables, pictures and written descriptions below and include:

- Geography & Environment
- Population
- Housing
- Public Facilities
- Schools
- Recreational Facilities
- Transportation
- Infrastructure
- Historic Places
- Agriculture

GEOGRAPHY & ENVIRONMENT

The eastern study area consists of approximately one-hundred sixty-nine square miles (107,859 acres) located in the county's planning jurisdiction within a geographic triangle created by Interstate 85, the Yadkin River and the common boundary with Cabarrus and Stanly counties. Typical of most counties in the Piedmont region of North Carolina, the study area is characterized by a rolling terrain where elevations smoothly transition between 560- 850 feet. However, instances of peaks rising to 900-1000 feet above the general landscape include Dunns Mountain, Balfour Mountain and Flat Swamp Mountain at High Rock Dam; the lowest elevation in the County is found along the shoreline of Tuckertown Reservoir. Perhaps the most significant geographic feature in the study area is the Yadkin River



Figure 2 – High Rock Lake
Source: Rowan County Dept. of Planning & Development, 2011

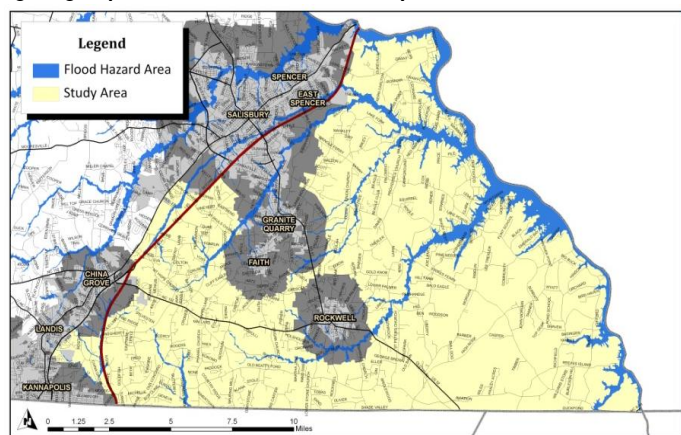


Figure 3 – Study Areas Flood Hazard Areas
Source: NC Floodplain Mapping Agency, 2009

and its resultant reservoirs, High Rock and Tuckertown, formed by dams located within the run of the river. High Rock Lake and Tuckertown Reservoir are the first two of four lakes in the Uwharrie chain of lakes managed and operated by the Yadkin Division of Alcoa Power Generating Inc. (ALCOA). Completed in 1927 and 1962 respectively, High Rock and Tuckertown provide many recreational opportunities for the region and are also used for hydroelectric power generation. According to ALCOA data, the High Rock facility has a licensed capacity to produce 39.6 megawatts of power and Tuckertown a capacity of 38.04 megawatts of power; both facilities are



remotely operated from a location in Alcoa, Tennessee.

Streams within the county are generally oriented in a northeasterly direction and drain toward the Yadkin River. Significant tributaries within the study area exhibiting this drainage pattern are Church, Crane, Panther, Reedy, Riles, Dutch Second and Town creeks. The exception to this drainage pattern is created by the east-west ridge utilized by the East NC 152 Highway roadway that separates the Yadkin drainage system from that of Rocky River. Southward flowing streams in the study area are Coldwater and Dutch Buffalo creeks.

Flood hazard areas associated with creeks, streams and lakes account for 3,410 acres in the study area (see Figure 3 above). Prior to the 2009 adoption of an updated flood damage prevention ordinance and digital mapping provided by the NC Floodplain Mapping Agency, the determination of potential flooding impacts to development proposals were based on hard copies of FEMA's Flood Insurance Rate Maps (FIRM) published in November 1979.

Development in the flood hazard areas is discouraged, although by elevating or flood-proofing a structure two feet above the base flood elevation of the flooding source allows structures to be built in the 100-year floodplain.

Water supply watersheds within the study area include Cold Water Creek, Dutch Buffalo Creek and Tuckertown Reservoir. As the name implies, these watersheds are a water supply source for municipal users. Specifically, Coldwater Creek is a source for the City of Concord; Dutch Buffalo for the Town of Mt. Pleasant; and Tuckertown for the City of Albemarle. Regulations for land development activities in watersheds are based on a WS-I thru WS-IV tiered system and employ a built-upon area limitation for non-residential uses and a minimum lot size for

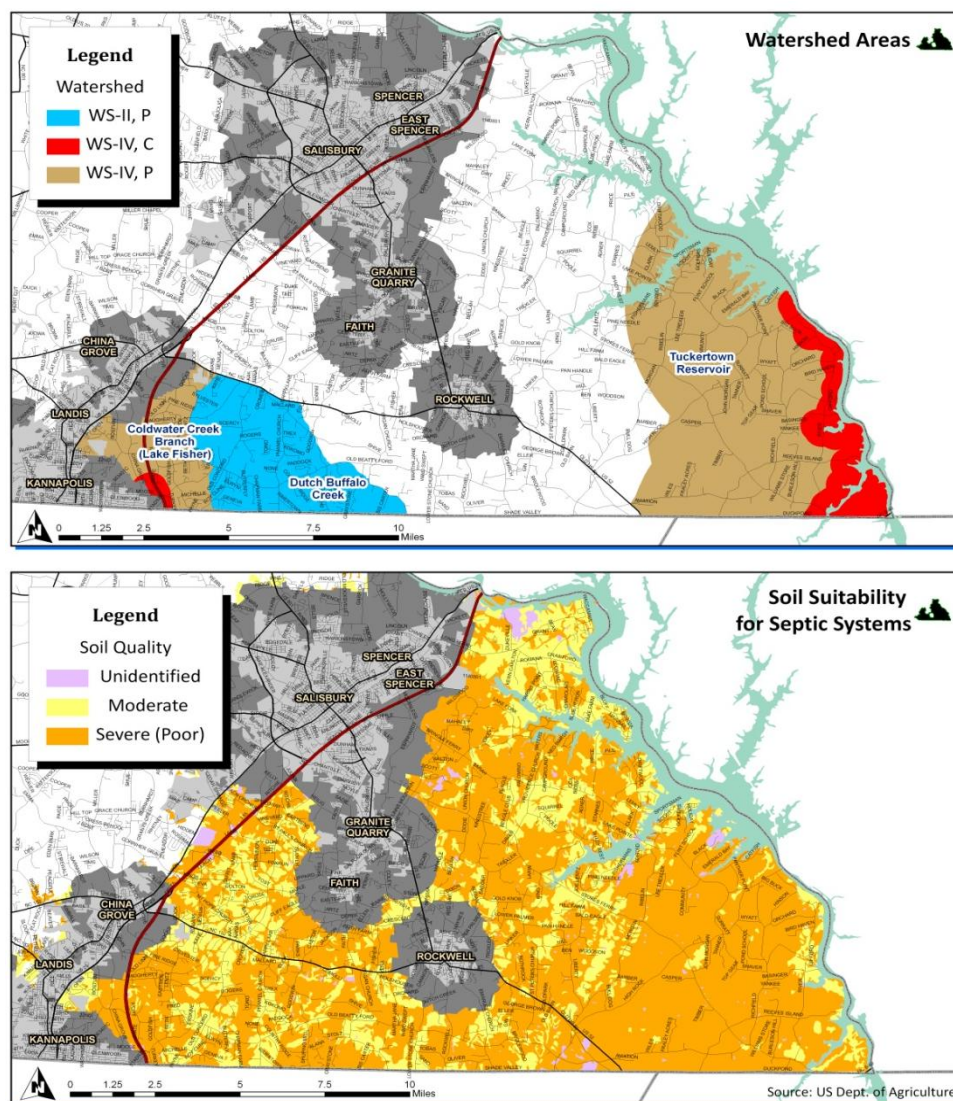


Figure 4 – Study Area Watershed Areas, Soil Suitability for Septic Systems
Source: Rowan County Dept. of Planning & Development, 2011;
United States Department of Agriculture, 2011



residential uses. Rowan County adopted a watershed ordinance in January 1994 and later incorporated the standards into the countywide zoning ordinance adopted February 1998.

Given that land development potential in the study area will continue to be reliant upon ground absorption sewerage systems (septic tanks), soils in the study area have been grouped according to their ability to accommodate septic systems (see *Figure 4* above). Soils included in this generalized collection of types in the moderate category tend to be Cecil, Rion-Wedowee complex and Tatum with the severe category including Ashlar, Badin, Cid, Enon, Goldston, Misenheimer, Uwharrie and Vance soils. From a general perspective, the more suitable areas for development based on this grouping occur in the northern portion of study area in the vicinity of Long Ferry Road; the Bringle Ferry and Providence Church Road area; and the land area west of Faith and Rockwell toward I-85 and the limits of the study area (see *Figure 4* above). Soils east of a line formed by Morgan and Ribelin Roads create the “Carolina Slate Belt”. The name is derived from the metamorphic soils in this area which are acidic, poorly drained and typically less than forty inches to slate rock.

As exemplified by the town names of Granite Quarry and Rockwell, occurrences of granite outcroppings are prominent within the study area and dimensional stone operations quarrying for this resource still exist or evidence of their operations can be viewed at dormant sites.

POPULATION

During each decade between 1970 and 1990, Rowan County’s population increased by nearly 10,000 persons, which was consistent with its surrounding counties (see *Appendix A for details*). The county’s population experienced its largest increase to date at nearly 20,000 persons or 18% growth rate during the 1990s. Neighboring Iredell and Cabarrus counties experienced a more significant population increase during this period, with 30,000 new residents each, a rate increase that appears to have spread from Mecklenburg County, beginning in the 1980s.

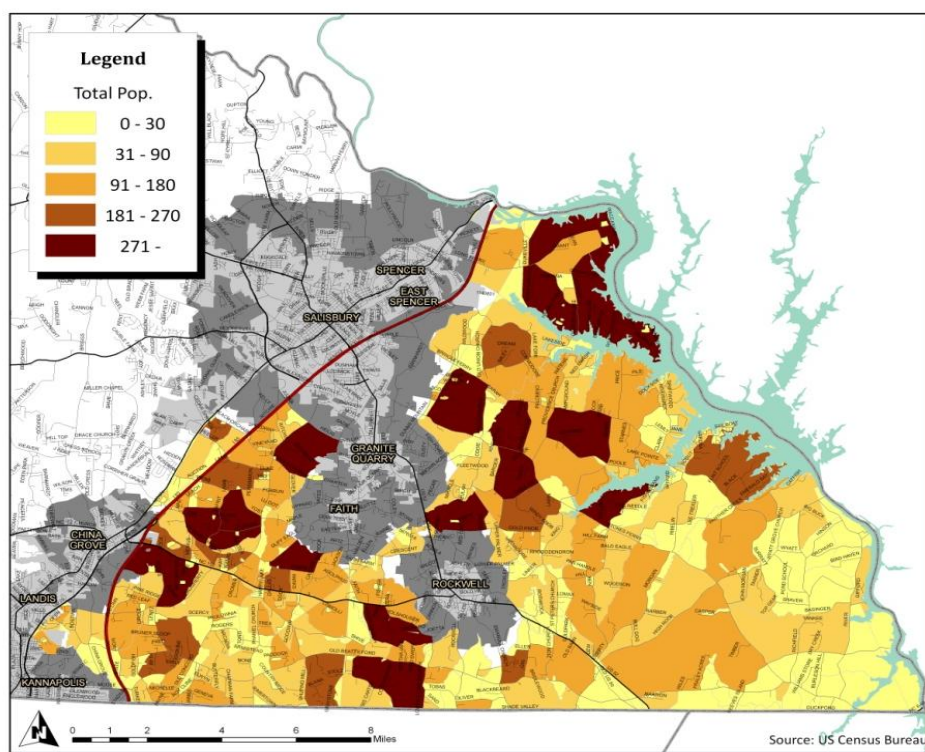


Figure 5 – Study Area Population 2010

Source: US Census Bureau, 2011

Rowan County’s population growth in the 2000s slowed to a pace comparable to the period between 1970 and 1990 with only 8,100 new residents while Iredell and Cabarrus counties continued growing at rates greater than 30%, with 47,000 and 37,000 new residents respectively. Rowan County is currently processing a population count dispute for the 2010 census.

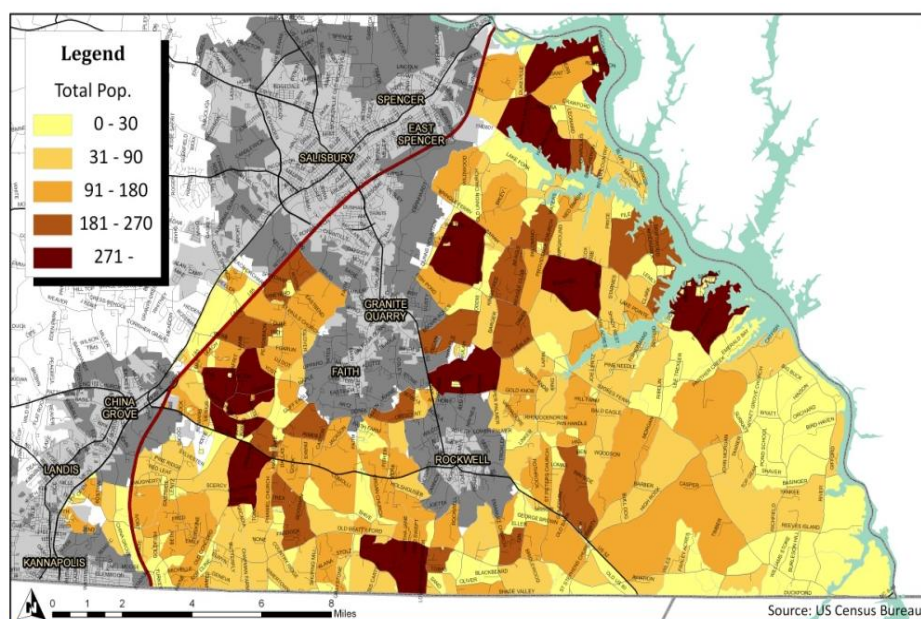


Figure 6 – Study Area Population 2000
Source: US Census Bureau, 2011

During the 1990s, the study area experienced a higher proportion of the county's growth at 28% compared to an 18% growth rate as a whole. The study area's growth rate was consistent with the county's in the 2000s with 8% and 6% rates respectively. Most of the added population appears to have settled evenly across areas within two miles of the municipalities with the exception of developments adjacent to High Rock Lake. While a significant number of major subdivisions were established in the area during this time, an equal

share of other census blocks in the study area experienced similar population increases without this type of activity. During this time period, Morgan Township continued to have a very low population compared to its overall land area while most all other areas in the east experienced growth.

According to the North Carolina Demographer's Office, Rowan County is estimated to grow at a similar rate experienced during the 2000s (6%) or approximately 9,000 residents in the years leading up to 2020 and 2030, comparable to Montgomery and Stanly counties. Estimates for faster growing neighbors Iredell and Cabarrus counties suggest population gains approximately half that experienced over the previous two decades but still anticipating a population increase of over 25,000 and 40,000 respectively over the next two decades. With the uncertain economy and housing industry, it would be very difficult to put significant confidence in these projections over the next twenty years.

Geography	1990	2000	2010	1990-00 (%) Δ	2000-10 (%) Δ	1990-10 (%) Δ
Study Area	19,908	25,467	27,515	27.9	8.0	38.2
Rowan County	110,605	130,340	138,428	17.8	6.2	25.2
Cabarrus County	98,935	131,063	178,011	32.5	35.8	79.9
Davidson County	126,677	147,246	162,878	16.2	10.6	28.6
Iredell County	92,935	122,660	159,437	32.0	30.0	71.6
Stanly County	51,765	58,100	60,585	12.2	4.3	17.0
North Carolina	6,628,637	8,049,313	9,535,483	21.4	18.5	43.9
United States	248,709,873	281,421,906	308,745,538	13.2	9.7	24.1

Table 1 – Population Change 1990 – 2010
Source: US Census Bureau, 2011



HOUSING

Housing Stock

Rowan County's housing stock is largely comprised of stick-built / modular dwellings (66%) and manufactured homes (20%). The remaining housing stock is comprised of two or more unit structures, which are mostly located within the municipalities. From 1970 to 1990, manufactured homes gained a larger percentage of the overall housing unit type in Rowan County and its surrounding counties before leveling off in 2000. At that time manufactured homes comprised twenty-five percent (25%) of the total housing units in neighboring Davie and Montgomery counties while Rowan County was at twenty-one percent (21%). While mobile home totals in all neighboring counties continued to increase slightly thru 2010, Cabarrus County has remarkably decreased back to their 1990 level (see Appendix A).

From the mid-1980s to mid-1990s, mobile homes comprised fifty percent (50%) of the total housing units permitted in Rowan County. By 2003, single-family dwellings represented more than twice the overall

housing unit type and continued to gain a higher proportion each year thereafter. Single-family residential permits in the county reached an all-time high in 2007 at just over 700, twenty-five percent (25%) of which were issued in the study area. The study area received a considerable portion of the new home construction evident in forty-two percent (42%) of its 9,500 housing units constructed since 1990.

In the fall of 2008, single-family residential construction began a sharp decline that continues in 2011. According to Diane Greene, Rowan County Board of Realtors, an average of 1,500 homes, most of which are foreclosures, remain on the market compared to approximately 350 prior to the housing decline. This excess supply has lowered the price of home sales and reduced interest in platting new subdivisions.

Major Subdivision Development

Major subdivisions in Rowan County are defined as the creation of more than eight lots or the dedication of a new right-of-way. An average of seventeen requests were approved annually from 1994 (year Rowan County's Subdivision Ordinance adopted) to 2008 each producing approximately twenty new lots or nearly three hundred-fifty new lots annually. Residential tract building, which was prevalent in the Charlotte region during the 1990s and 2000s, was largely void in Rowan County due to the absence of public water and sewer outside the municipalities. Instead, most subdivisions were established by local developers providing half acre or greater sized lots to account for on-site well and septic systems and / or the soil percolation limitations in the study area. Average lot sizes for subdivisions in the mid-to-late 2000s totaled two acres compared to the previous ten year period, where the average was one acre. This trend, which was also experienced in the western portion of the county, was contrary to previous developments that attempted to maximize the

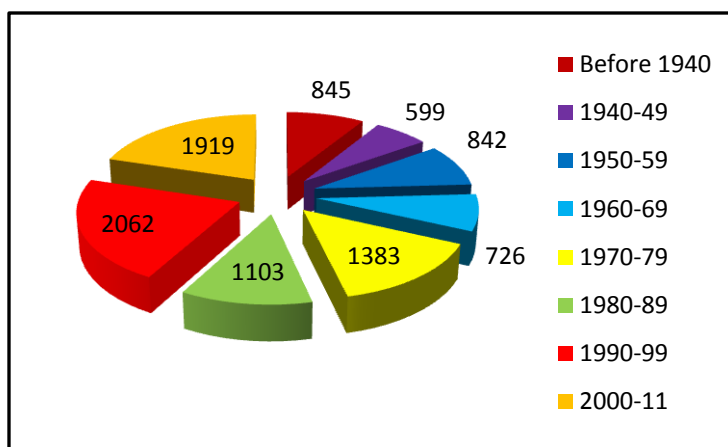


Figure 7 – Study Area Housing Units
Source: Rowan County Dept. of Planning & Development, 2011



number of lots the property could support. The majority of these projects were not hindered by poor soil conditions or other environmental constraints suggesting a rising interest in a lower density setting.

Most of the subdivision activity has occurred in the southern end of the county between the municipalities and Cabarrus County. High Rock Lake also experienced considerable subdivision activity increasing the number of primary residences into this area previously filled by vacationing homes. The number of new lots created in major subdivision changes rather dramatically each year in all parts of the county averaging roughly three hundred-fifty each year from 1994 to 2008. In 2006, nearly three-hundred lots were established in the study area, representing the only year since the inception of the subdivision ordinance when growth in the east outpaced the west.

The housing industry decline in the fall of 2008 brought major subdivision activity to a halt in 2009 as no new lots have been created in the study area since. Many subdivisions established a few years before the decline contain a large inventory of vacant lots, many of which have been sold but the property owners have delayed construction.

Year	# of Subdivisions	Lots	Acres
1994	2	38	113.18
1995	9	130	202.79
1996	8	96	200
1997	3	64	58.48
1998	6	89	73.89
1999	12	226	226.74
2000	7	63	61.15
2001	10	221	159.56
2002	14	184	219.71
2003	6	184	92.97
2004	4	52	42.44
2005	9	155	327.18
2006	13	295	384.65
2007	8	177	388.43
2008	5	74	141.61
2009	0	0	0
2010	0	0	0
Total	116	2,048	2,692.78

Table 2 – Study Area Approved Major Subdivisions
Source: Rowan County Dept. of Planning & Development, 2011

Year	Single-Family	Mobile Homes	Year	Single-Family	Mobile Homes
1980	302	not listed	1996	584	870
1981	191	not listed	1997	579	937
1982	192	not listed	1998	689	969
1983	313	not listed	1999	683	787
1984	missing file	...	2000	650	638
1985	missing file	...	2001	643	479
1986	402	890	2002	655	453
1987	443	913	2003	515	281
1988	432	821	2004	626	268
1989	363	826	2005	638	193
1990	393	796	2006	650	159
1991	389	721	2007	705	128
1992	434	698	2008	552	96
1993	442	807	2009	231	88
1994	506	912	2010	180	81
1995	528	966			

Table 3 – Residential Building Permit Data, Rowan County, NC (1980 – 2010)
Source: Rowan County Department of Building Inspections, 2011



PUBLIC FACILITIES

Fire Services

Throughout the unincorporated areas of Rowan County, fire protection is provided by local nonprofit volunteer fire departments under contract with the County. Acquisition and maintenance of department equipment, property, supplies and personnel training are funded through a fire district tax levied annually at a district specific rate approved by the County Commission. For FY 2011-12, County appropriations to operate the selected rural volunteer fire services within the study area are displayed in *Table 4* below.

Excluding municipal locations, the study area has nine fire response districts serviced by contracted volunteer fire departments. All districts have at least one fire station; Liberty has two; and the Richfield-Misenheimer district is serviced by a location in Stanly County.

FIRE DISTRICT	TAX RATE*	FY 2011-12 APPROPRIATION	PPC RATING
Bostian Heights	.0620	\$429,970	6
East Gold Hill	.0600	\$70,110	9S
Liberty	.0527	\$187,393	6
Miller Ferry	.0700	\$289,275	6
Pooletown	.0522	\$51,326	9S
Richfield-Misenheimer	.0700	\$6,650	9S
Rockwell Rural	.0700	\$359,100	7
South Salisbury	.0775	\$254,006	6
Union	.0350	\$110,390	7

Table 4 – Study Area Fire District Data

Source: Rowan County Emergency Services, 2011

* Tax Rate factored at district specific rate per \$100 of property valuation

As a basis for evaluating the quality of public fire protection services throughout the United States, Insurance Services Office (ISO) analyzes the firefighting capabilities in a community and assigns a Public Protection Classification (PPC) number ranging from 1 to 10. Class 1 represents exemplary fire protection and Class 10 indicates that the area's fire protection program does not meet ISO's minimum standards. In turn, this PPC number is used by insurance providers to assist in developing premiums that reflect the risk of loss in a particular location. PPC ratings for fire departments within the study area are contained *Table 4* above.

The Rowan County Commission recognizes the importance of adequate fire protection for its citizens and has established a goal for fire districts to achieve and maintain a PPC rating of 6. Aside from equipment and training, the lack of sufficient water point sources within a fire district also impacts a fire district's PPC rating. Amendments to the County's subdivision ordinance in 2007 require newly created subdivisions of greater than fourteen lots provide an adequate water point source or be located within one road mile of an existing water point source. This water point source program was designed to maintain or increase PPC district ratings affected by new residential developments.

Law Enforcement and Public Safety

The Rowan County Sheriff's Office provides law enforcement response and protection in the unincorporated areas of eastern Rowan County by means of four different patrol zones. During any given eight-hour shift, a deputy sheriff is ideally patrolling his respective zone and provides response to



all criminal activities in their jurisdictional zone. Mutual aid relationships with all municipal law enforcement agencies provide assistance to the Sheriff's Office and vice versa.

The North Carolina State Highway Patrol Troop E headquartered at 5780 South Main Street in Salisbury is tasked with enforcement of vehicular laws on interstate and state roads, investigation of automobile accidents and emergency back-up to county law enforcement agencies.

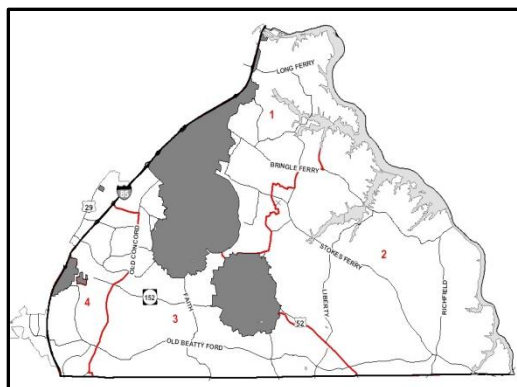


Figure 8 – Law Enforcement Response Zones
Source: Rowan County Sheriff's Dept., 2011

Emergency Medical Response

Emergency Medical Services (EMS) is a division of the County's Emergency Services Department that provides paramedic level services throughout the County and is funded by a combination of general tax revenues and user fees. Two stand-alone stations are strategically positioned within the study area at 2727 Old Concord Road and 270 St. Matthew's Church Road. EMS efforts are supplemented by the medical responder program supported by each volunteer

fire department.

The Rowan County Rescue Squad is a non-profit agency that is the primary provider of specialized rescue services throughout the County and maintains two stand-alone stations in the study area located at 1140 Julian Road and 114 E. Railroad Street in the Town of Rockwell and co-located sites with the Gold Hill and Miller Ferry Fire Departments. The presence of the Rescue Squad in the

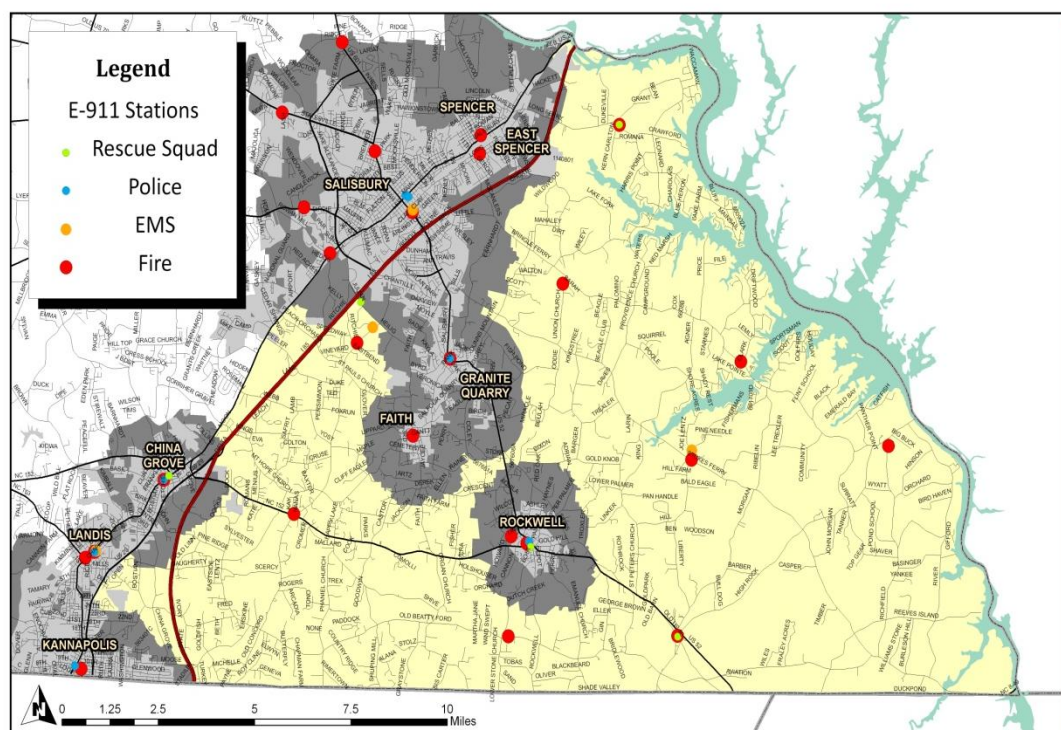


Figure 9 – Study Area E-911 Station Locations
Source: Rowan County Dept. of Planning & Development, 2011

eastern portion of the County is noteworthy, as many medical and emergency response incidents on High Rock or Tuckertown Lake rely on their specialized training and apparatus.



SCHOOLS

The Rowan-Salisbury School System (RSS) is a consolidated city-county system serving the entire county except for the City of Kannapolis. RSS is comprised of thirty-four schools of which twenty-one have a district totally or partially located within the study area. With an average age of forty-three years old, it is apparent these schools have been a fixture in the counties past while witnessing the population change over the past several decades. In regard to the increased population, four new schools have been constructed since 2000 in addition to the major renovations and additions to the others in the study area.

School	Yr. Est.	2007	2008	2009	2010	2011	2007-11 Δ	(%)2007-11 Δ
Bostian Elem.	1936	324	347	326	315	345	21	6%
C.C. Erwin Middle	1967	912	902	942	973	960	48	5%
China Grove Elem.	1924	686	651	615	588	538	-148	-22%
China Grove Middle	1930	624	607	608	590	598	-26	-4%
Corriher-Lipe Middle	1923	559	591	568	554	518	-41	-7%
East Rowan High	1959	1,254	1,245	1,179	1,110	1,074	-180	-14%
Elizabeth Koontz Elem.	2005	583	547	585	584	570	-13	-2%
Ethan Shive Elem.	2007	496	505	510	482	477	-19	-4%
Faith Elem.	1929	453	448	442	432	441	-12	-3%
Granite Quarry Elem.	1925	477	498	500	523	503	26	5%
Hanford Dole Elem.	1998	546	542	486	470	470	-76	-14%
Jesse Carson High	2006	1,086	1,178	1,191	1,173	1,177	91	8%
Knollwood Elem.	1976	636	673	611	632	638	2	0%
Landis Elem.	1952	584	603	540	534	542	-42	-7%
Morgan Elem.	1925	432	397	394	379	374	-58	-13%
North Rowan High	1958	724	710	665	663	691	-33	-5%
North Middle	1995	553	568	553	540	526	-27	-5%
Rockwell Elem.	1928	525	514	506	489	476	-49	-9%
Salisbury High	1925	992	1,030	938	904	875	-117	-12%
Southeast Middle	2000	754	746	786	742	776	22	3%
South Rowan High	1961	1,105	1,026	1,005	966	1,008	-97	-9%
District Total		20,883	20,901	20,571	20,192	20,082	-801	-4%

Table 5 – Study Area School Enrollment 2007 – 2011

Source: Rowan-Salisbury Schools, 2011

The opening of Jesse Carson High School in 2006 absorbed students from the other five high schools and provided additional capacity to address the existing and anticipated growth in southern Rowan County. While China Grove Middle School directs half to Jesse Carson and the other half to South Rowan high schools, Southeast Middle and the elementary schools within the new Jesse Carson district are well contained and have very little spillover to the other districts. Ethan Shive Elementary, constructed in 2007, is the lone exception supplying both Jesse Carson and East Rowan high schools. A



much closer match is found with the district boundaries for elementary and middle schools supplying the North and East Rowan High School with the lone exception being Shive Elementary.

Overall enrollment for the school district from 2007 to 2009 remained constant at 21,000 students but began to decline in 2010 and 2011, decreasing by a total of eight-hundred students. The majority of

schools in the study area experienced a slight decline while three schools - China Grove Middle (22%), East Rowan High (14%), and Salisbury High (12%) all declined by more than one-hundred students over this five year period. Only Jesse Carson experienced a noticeable increase in population with ninety-one new students.

Eight schools are identified as having capacity figures (not including mobile units) above 90%: Jesse Carson High, China Grove and Erwin Middle Schools, and Bostian, Faith, Knollwood, Koontz, and Morgan Elementary. Ninety percent capacity is generally the threshold where mobile units may be added to accommodate additional students. Only Bostian and Morgan Elementary schools are identified as “over capacity” at 102% and 104% respectively. Conversely, North Rowan High School is noticeably well under capacity at 56% or four-hundred eighty-six students from full capacity. According to RSS administrative staff, no new schools or major renovations are planned at this time.

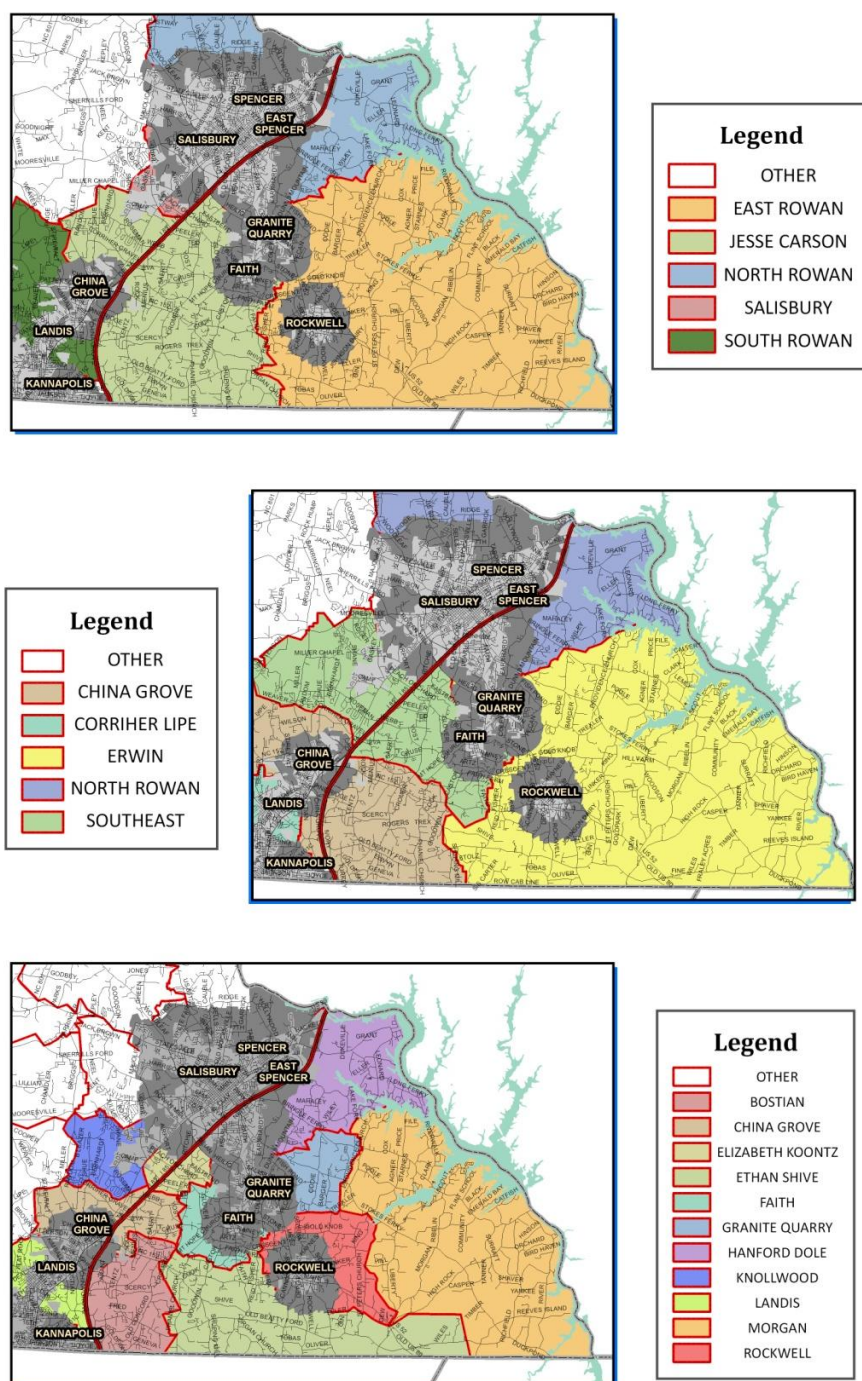


Figure 10 – Study Area School District Maps
Source: Rowan-Salisbury Schools, 2011



RECREATIONAL FACILITIES

The presence of High Rock and Tuckertown Lakes in the eastern portion of the County affords many recreational opportunities ranging from fishing and boating to hunting and camping. In addition to the lake resources, the Rowan County Parks and Recreation Department operates and maintains three locations offering unique recreation experiences at each site.

High Rock and Tuckertown Lakes

Owned and operated by the Yadkin Division of Alcoa Power Generating Inc., both lakes are popular destinations for water-based recreation activity. High Rock Lake is well known by anglers for its variety and stock of fish (catfish, crappie, bream, largemouth, white and striped bass) as evidenced by hosting a number of annual fishing tournaments, most notably the Bassmaster Classic in 1994, 1995, 1997 and 2007. The Yadkin River

Canoe Trail is a one-hundred sixty-five mile “blueway” that begins above High Rock Lake and travels the course of the Yadkin until its confluence with the PeeDee River.

Comparatively, canoeing opportunities are favored at Tuckertown due to the predominantly undeveloped state of its shoreline.

Many of the undeveloped properties located along the lakes owned by Alcoa are designated as Game Lands by the North Carolina

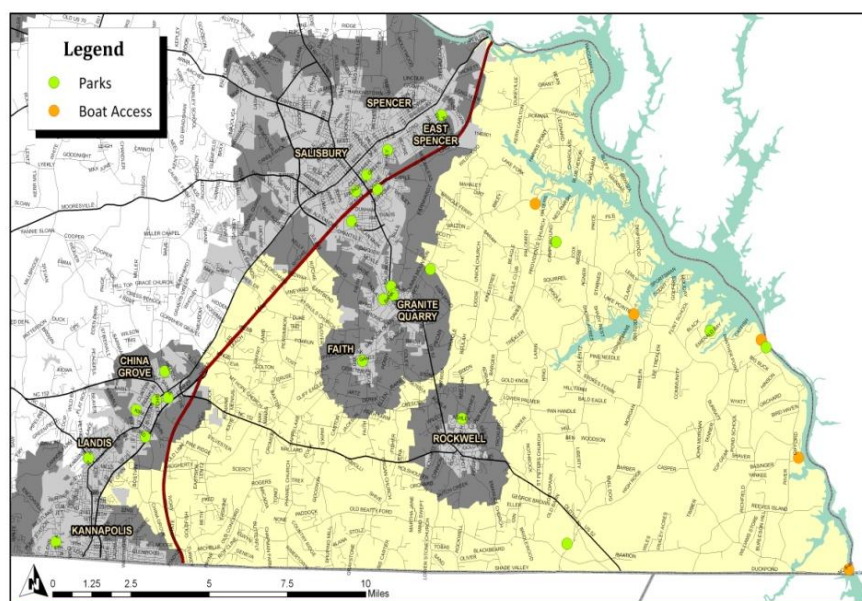


Figure 11 – Study Area Parks and Recreation

Source: Rowan County Dept. of Planning & Development, 2011

Wildlife Resources Commission

and are available for hunting opportunities subject to their laws and rules. Relative to the size of the lakes, public access is limited to only four improved boating launch points located in the study area at Tamarac Marina, Bringle Ferry Road (Davidson), River Road and NC 8/49 Highway (Stanly). A fifth primitive site is located on Providence Church Road.

Parks and Recreation

Dan Nicholas Park is a four-hundred twenty-five acre park located on Bringle Ferry Road and is recognized as a recreation destination for families and school-aged children within the region. The park facilities include camping, picnic shelters for rent, carousel and train, miniature golf, playgrounds, family gem mine, paddleboats, nature center and barnyard zoo and many other recreational opportunities. School and group programs are available for free by appointment on nature and geology topics. There are a variety of special events during the year. Eagle Point Nature Preserve is a two-hundred acre preserve located at the end of Black Road bordering High Rock Lake. The Preserve is host to native plants and animals and also offers over three miles of hiking trails and canoe access to High Rock Lake. Dunn's Mountain Nature Preserve is an eighty-three acre site located at the intersection of Dunn's Mountain and Stokes Ferry roads. Opened in 2006, it is Rowan County's newest



park and was once an active dimensional stone quarry mined for granite. The site offers hiking trails, interpretive centers and most notably its spectacular views of the eastern portion of the county and the Uwharrie Mountains. On clear days vistas can include the Brushy and Blue Ridge Mountains and a large part of the western piedmont. The Historic Gold Hill and Mines Foundation, Inc. manages the Gold Hill Historic Park located in the Village of Gold Hill at 735 St. Stephens Church Road. The park includes a playground, amphitheater, hiking along the rail trail and the Russell-Ruffy Memorial Shelter and Log Barn for rental occasions. Within the study area, baseball, football and soccer fields and basketball courts are located in Granite Quarry, Faith and Rockwell. The Saleeby-Fisher YMCA East Rowan Branch located on

Crescent Road between Faith and Rockwell provides a host of recreation opportunities and programs for youth and adults. A local non-profit organization, East Rowan Diamond Sports, has taken the initiative to address the absence of fields in the area by obtaining zoning approval to construct a baseball and softball complex on a forty acre site located at the end of Fleetwood Drive. The Rowan County Bicycle Map project was completed by NC DOT in 2009 and utilizes signed routes along existing state maintained roads to access points of interest, convenience stores, campgrounds and amenities for cyclists touring the area. Routes 1, 2 and 5 are located in the study area.

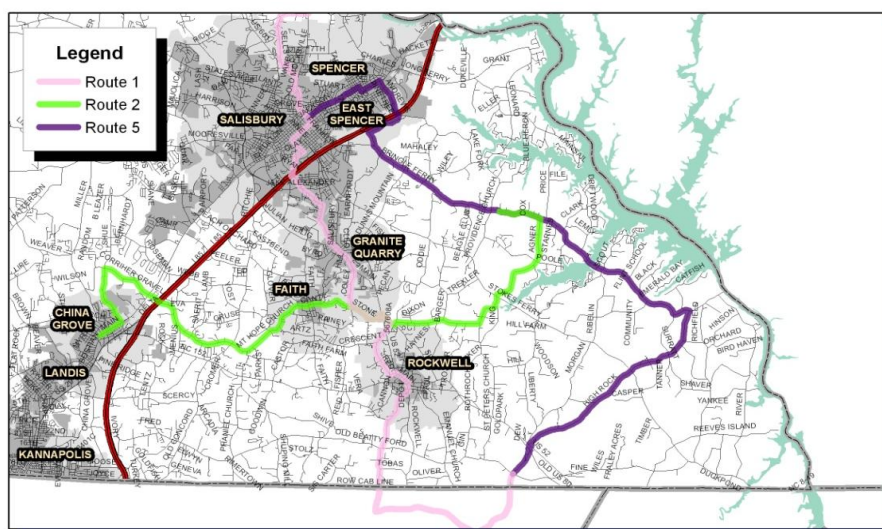


Figure 12 – Study Area NCDOT Bicycle Routes
Source: North Carolina Department of Transportation, 2009



Figure 13 – High Rock Lake, Tuckertown Reservoir & Gold Hill Historic Park
Source: Rowan County Dept. of Planning & Development, 2011

TRANSPORTATION

Rowan County is a participating jurisdiction in the Cabarrus-Rowan Metropolitan Planning Organization (CRMPO) which has been federally designated to administer the transportation planning process in the two counties. Federal requirements dictate the organization's Transportation Advisory Committee (TAC) prioritize highway, transit, bicycle and pedestrian projects and allocate funding sources for implementation (see Table 6 below for selected road improvement projects in study area). As a whole, the study area has adequate transportation access to both interstate and municipal service centers as



Priority Number	Description
Division 9 # 1A	Widen I-85 from NC 73 to Exit 68 in China Grove and combine interchange improvements at Exit 68 and a new interchange at Old Beatty Ford Road
Division 9 # 1B	Widen I-85 from north of Exit 81 to Exit 87 including replacement of Yadkin River bridge and preservation of the Wil-Cox bridge on US 29
Division 9 # 3	New alignment of Church Street and NC 152
Division 9 # 4	Widen and relocate US 52 from NC 49 to I-85
Division 9 # 7	Julian Road widening from Jake Alexander Blvd. to Summit Corporate Center
Division 9 # 8	Old Concord Road widening from Town Creek to Summit Corporate Center
Division 9 # 9	Improvements to Old Beatty Ford Road
Division 9 #13	Jake Alexander Blvd. extension from Stokes Ferry Road to relocated US 52
Division 9 #18	Widen NC 152 from I-85/US 601 interchange to R 2903

Table 6 – Study Area Transportation Improvement Projects
Source: Cabarrus-Rowan Metropolitan Planning Organization, 2011

evidenced by the radial network of roads (Bringle Ferry, Long Ferry, Stokes Ferry, and US 52), the north-south orientation of Old Concord and Faith Roads and east-west corridors of NC 152 Highway East and Old Beatty Ford Road. Adequate mobility within the study area is contrasted by the limited points of inter-county access across the Yadkin River. Interstate 85 / US 29 Hwy, Bringle Ferry Road and NC 8 /49 provide the only opportunities to cross the river.

Interstate 85

The presence of Interstate 85 as a generator of economic opportunity is not only significant to Rowan County, but is also vital to regional, statewide and interstate commerce. According to NC DOT estimates for 2010, an average of 68,000 vehicles travelled the I-85 corridor daily through Rowan County. Recognizing the corridor's inherent economic opportunities and development potential, improvements and maintenance of Interstate 85 continue to be a priority of Rowan County. The County's top two transportation projects, I-3802 and I-2304, advocate widening and interchange improvements in this corridor. Currently in progress, Project I-2304 is a \$163 million investment that will replace the current four-lane Yadkin River Bridge to a new location having a ten (10) lane deck and includes widening I-85 north of Exit 81 to Exit 87 in Davidson County to eight (8) lanes. The project is scheduled for completion in January 2013.

I-3802 is a multi-faceted I-85 improvement project in both Rowan and Cabarrus counties that will have a profound impact on the landscape of southern Rowan County once completed. Although the Rowan portion of the project is currently programmed for the 2025 horizon year, the Cabarrus County portion includes widening from NC 73 to the Cabarrus - Rowan County line and has been advanced to FY 2016 in the state's Transportation Improvement Program. Splitting I-3802 into two distinct phases will certainly limit the benefits gained by previous projects north and south of Rowan's I-3802 segment as traffic will be forced from an eight to four lane bottleneck. Similarly, a further division of Rowan's I-3802 into three individual projects would lessen both the economic and transportation advantages to the County and region. The County advocates the Rowan portion of I-3802 be accelerated on the same schedule as the aforementioned Cabarrus project to fulfill the integrity of the overall project.

Specifically, Rowan's portion of the I-3802 project attempts to remedy the absence of a fully functioning interchange in a seven-mile segment of I-85 between Webb Road at Exit 70 and Lane Street at Exit 63 in Cabarrus County by promoting:



- Widening of I-85 from the county line north to Exit 68 in China Grove
- Conducting interchange improvements at Exit 68 (I-3610 project)
- Constructing a new interchange in the vicinity of Old Beatty Ford Rd (I-3804 project)

Relative to its location in south Rowan, the construction of an I-85 interchange at Old Beatty Ford Road may have the greatest economic impact to the study area and to the overall I-3802 project. Aside from the interstate and state highways, Old Beatty Ford Road is the longest road in the County and is a vital link between the Gold Hill – Rockwell environs to I-85 and its proximate municipalities. The economic development potential of a new interchange was recognized by the City of Kannapolis in 2009 when it obtained special legislation to annex three-hundred twenty-seven acres approximately one-half mile north of the current Old Beatty Ford Road alignment. Preference for a site north of the current alignment is based on the compilation of parcels on both the east (thirty acres) and west (two-hundred ninety-seven acres) sides of I-85 owned by a development partnership which has been referred to as the Southland Development. Given that annexation has been delayed until 2013, the County still maintains planning jurisdiction of the area and acknowledges the potential commerce opportunities with a regional node designation. Regardless of location, an interchange at Old Beatty Ford Road will certainly benefit Rowan County and municipalities surrounding the site as well as increase the tax base.

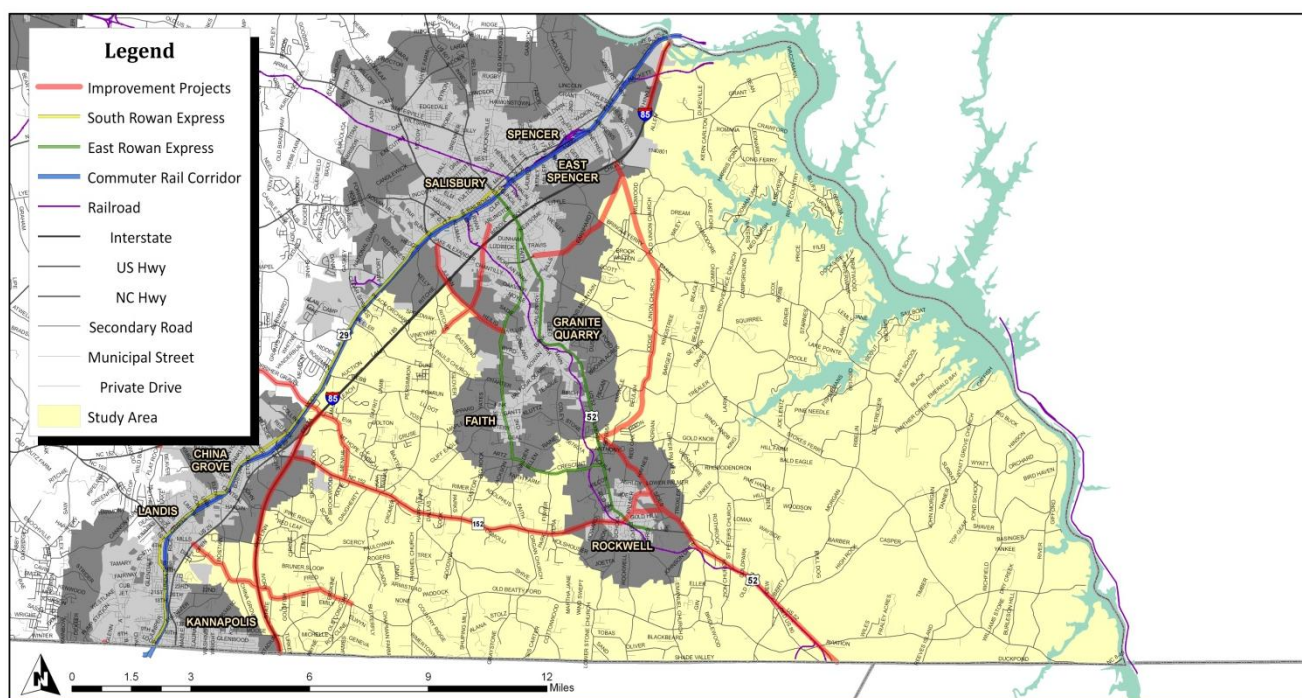


Figure 14 - Study Area Transportation Map
Source: Rowan County Dept. of Planning & Development, 2011

US 52 Highway

In two previous decades, bypass alternatives of the current US 52 location were proposed and studied by NC DOT, but an inability to select a viable option that satisfied regulatory agencies and citizens alike caused the project to stall. The US 52 project (R-2903) suggested by the Towns of Granite Quarry and Rockwell and recommended by the CRMPO widens and upgrades US 52 on its current location north from the county line; employs Sides Road to bypass the Town of Rockwell back to its



current location near East Rowan High School; then creates a northeasterly route to connect and utilize Oddie and Union Church Roads; and eventually creates a northwesterly course from its intersection with Bringle Ferry Road to join I-85 at exit 79 in East Spencer.

Although a CRMPO priority, the project is programmed for the 2035 horizon year and functional roadway designs have not been prepared nor have alignments for proposed routes been identified. This being the case, no corridor preservation is likely to occur.

North Carolina Railroad Corridor

The rail segment paralleling I-85 is managed and owned by the North Carolina Railroad (NCRR) Company and is designated as a link in the Southeast High Speed Rail Corridor providing passenger rail service between Charlotte and Washington, DC. Not only is the corridor important for the eight passenger trains per day, but also vital to the movement of freight transportation as this corridor accommodates more than fifty freight trains per day.

The NCDOT Rail has committed to invest \$10 million to double track the rail corridor segment between Salisbury and Kannapolis beginning in 2012 using American Recovery and Reinvestment Act funds. The five year project is estimated to cost nearly \$64 million. Once completed, the second track will reduce congestion and delays, increase capacity, and enhance safety.

Norfolk-Southern Railroad Corridor

The “N-Line” is a twenty-seven mile branch that runs from Yadkin Junction to Albemarle, NC connecting to the main line in Salisbury. Norfolk Southern provides local service to approximately a dozen industries engaged in manufacturing and distribution in Rowan and Stanly counties. Rail service is four days per week, Monday thru Thursday, which meets current industry shipping requirements. The downturn in the housing market has significantly impacted traffic on this line as many users are engaged in manufacturing and distribution of construction products. Service intervals are adjusted as needed.

Track speed is generally 25MPH on the branch. The last heavy maintenance program was 2004 which included installation of new ties and surfacing track with new ballast. The branch line maintenance cycle is every 10 years, so it is anticipated that 2014 will be the next program maintenance interval.

Transit

Since the summer of 2010, Rowan Transit has been operating a fixed route weekday service to eastern Rowan County serving the Towns of Faith, Rockwell and Granite Quarry. This new service is a connecting service to the Salisbury Transit System and the Rowan Express South to downtown Kannapolis. Transfers are free and fare is \$1 per trip. The Rowan Express East begins service at 6:52 in the morning with three trips in the AM and four trips in the PM ‘til 5:17. Stops include the Health Department and Social Services, Brinkley Center, East Rowan Library, Saleeby-Fisher YMCA, Rockwell Food Lion, and Faith Baptist Church. Ridership has grown to about five-hundred patrons per month. Transit service is an important component to meeting federal air quality and ozone standards for the county and region. Rowan County has been a leader in this effort.

INFRASTRUCTURE

Water and sewer infrastructure within the study area are generally limited to service in municipal jurisdictions. During the past several years Salisbury-Rowan Utilities (SRU) has assumed ownership and maintenance of the China Grove (2011), Granite Quarry (1997) and Rockwell (1997) systems and is a contract operator of the East Spencer system providing bulk water and sewage treatment. Although the



Town of Faith operates a system independent of SRU, their sewage discharge is treated at SRU's Town Creek wastewater treatment facility. SRU's influence in water and sewer provision has positioned the agency as the County's primary provider of these services.

Similar to the other municipalities in the County, water and sewer services currently provided by the City of Kannapolis are limited to its corporate limits. Current policies for both SRU and Kannapolis are 'development-driven' indicating that projects would have to pay for water and sewer service to be extended to their site. SRU is considering an extension policy for in-fill areas within or adjacent to existing service lines.

The Pfeiffer – North Stanly Water District is a rural water authority based in Richfield, NC that provides only water service to residential and commercial customers north of the City of Albemarle, NC in Stanly County. The district purchases water from the City which is pumped from Tuckertown Reservoir. The district has a nominal presence in Rowan County along Stokes Ferry Road, but is considering an eight inch line extension along Old US 80 Highway to serve industrial users, Stalite and Vulcan, as well as residential customers along the proposed line.

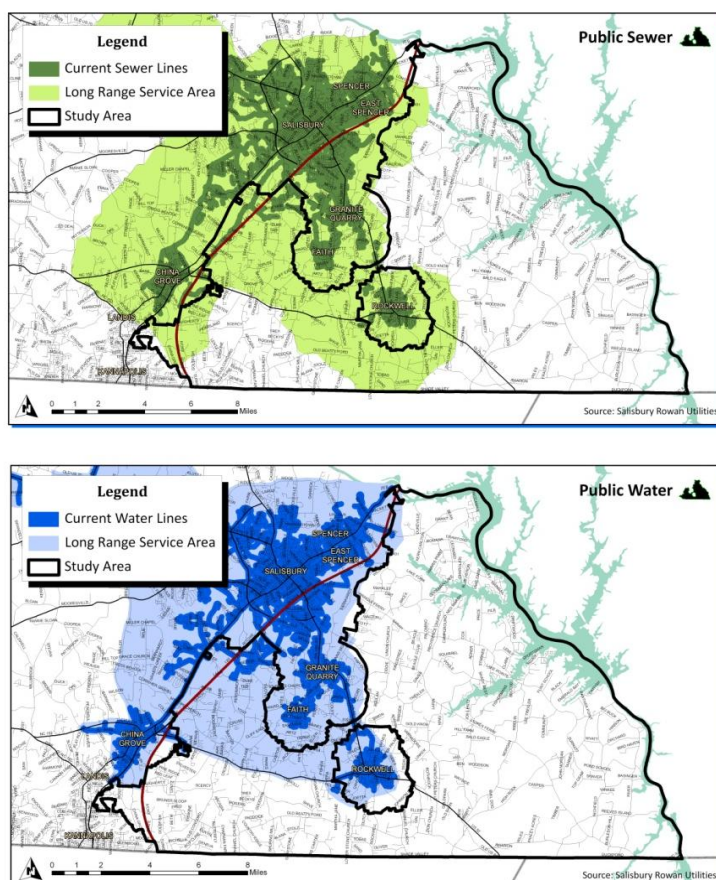


Figure 15 – Study Area Infrastructure
Source: Salisbury-Rowan Utilities, 2011

A notable exception to the municipal infrastructure locations is the Town Creek sewer project completed in 2010 as an equitable partnership between the county and City of Salisbury. The Town Creek line parallels the I-85 corridor and provides economic development opportunities for the eighteen square mile basin, much of which is located in the county's planning jurisdiction. The Town Creek wastewater treatment plant has a capacity of five million gallons per day and is currently processing approximately 2.4 million gallons per day.

Referendums for countywide infrastructure were defeated in 1971 and 1974 respectively. Consequently development within the study area not located in a municipality is reliant upon groundwater wells and septic tank disposal systems. The absence of infrastructure has not proven to be a deterrent to residential development in the study area, but more of a challenge for locating tracts suitable for septic systems and in turn, has maintained its rural, low-density character. Considering soil limitations and sizing constraints for septic systems combined with contamination potential and capacity issues for ground water wells, future development in the study area could benefit from the strategic placement of water and sewer infrastructure.



HISTORIC PLACES

Population and housing data for the study area are indicative of growth patterns experienced throughout most of the southeastern United States, where the majority of development has occurred over the past three decades. Often forgotten amongst the residential subdivisions and strip commercial centers of today's development practices are the concentrations of historic structures in areas of strategic and historic importance (water

sources, market crossroads, etc). The largest concentration of these historic places in the study area is in the area south of NC 152 between China Grove and Rockwell or the southern halves of China Grove, Litaker and Gold Hill townships (see Figure 16). In this area, five structures/properties are recognized on the National Register of Historic Places and include the:

- Grace Evangelical and Reformed Church – Lower Stone Church (Started 1795, Dedicated 1811)
- Organ Zion Lutheran Church (Dedicated 1796)
- John Stigerwalt House (1811)
- George Matthias Bernhardt House (1854)
- Shuping Mill Complex (1895)

The study area's significance in terms of religious architecture is due to its collection of distinguished historic churches. Few places in North Carolina can lay claim to having one rural eighteenth century church structure, the study area has two – Grace Evangelical and Reformed Church and Organ Zion Lutheran Church. Recently recognized as a *Rowan County Historic Landmark*, Organ Zion Lutheran Church is the oldest Lutheran church in North Carolina and the oldest church in Rowan County. Also located in the study area is the small village of Gold Hill which played a central role in the gold mining history of North Carolina. The village has been subject to extensive preservation efforts that document the industrial, commercial and residential building that occurred between 1842 and 1915.



Figure 17 – Examples of historic structures in the Study Area

Source: Rowan County Dept. of Planning & Development, 2011

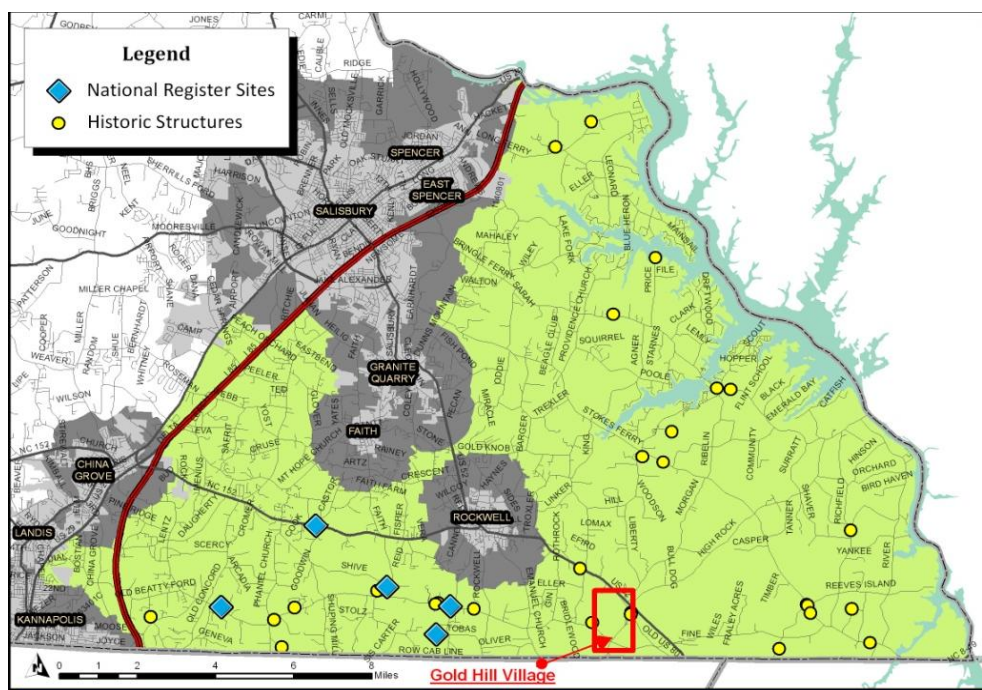


Figure 16 - Study Area Historic Places

Source: Rowan County Dept. of Planning & Development, 2011



AGRICULTURE

According to the North Carolina Cooperative Extension, Rowan County has nine-hundred eighty three working farms that primarily raise beef, dairy and field crops consisting of corn, soybeans, small grains and hay with annual cash receipts of sixty-two million dollars. The study area is similar to the western study area in the fact that it is primarily rural in character and is dominated by agricultural lands. Of the roughly 92,344 acres of land in the eastern study area, 40,406 acres (44%) are enrolled in Present-Use Value Assessment Program, commonly referred to as the “Agriculture Use” program. The 2006 Machinery Act establishes minimum acreage and revenue amounts for participation in the program. Enrollment in the program is voluntary and may not include all property that is in farm use. The program includes the following uses:

- Croplands
- Pasturelands
- Woodlands
- Horticulture
- Wastelands

In addition to traditional farming activities, there are also opportunities for agriculture-based tourism in the study area that includes but is not limited to the petting barn at Dan Nicholas Park, Morgan Ridge Vineyards and the Old Stone Winery in Granite Quarry. According to the most recent North Carolina Cooperative Extension *Plan of Work for Rowan County*, agri-tourism contributes over one-hundred eighteen million dollars annually to the county’s economy, while Dan Nicholas Park is the number one field trip destination in North Carolina with 123,137 visitors annually.

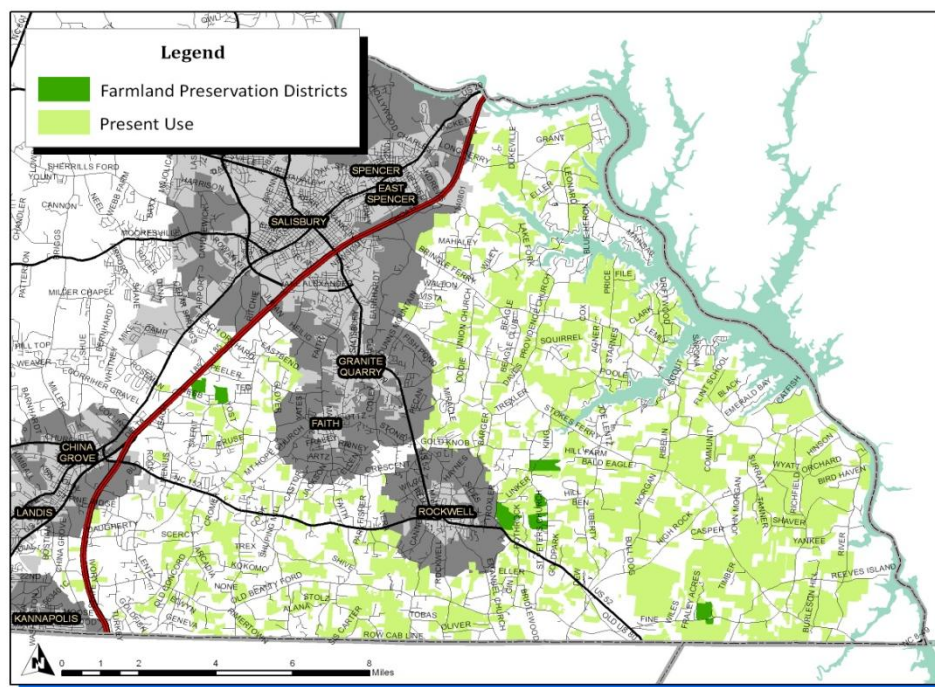


Figure 18 - Study Area Present Use & Farmland Preservation
Source: Rowan County Dept. of Planning & Development, 2011



Figure 19 - Agricultural areas, Dan Nicholas Park
Source: Rowan County Dept. of Planning & Development, 2011



FUTURE LAND USE RECOMMENDATIONS

Committee A of the Rowan County Planning Board has developed a series of future land use recommendations (draft) that are also utilized in the County's Land Use Plan for Areas West of I-85. These recommendations were presented to the public during a series of workshops held in September 2011. Following the workshops, comments and suggestions received from the public will be discussed by the Planning Board and may be included as recommendations or additions to the future land use map. The Planning Board will provide a final recommendation to the Board of Commissioners following a public hearing.

The recommendations are categorized by the three planning areas and several land use categories (see *Table of Contents*). The recommendations are intended to guide future land use and land use decisions within the eastern half of the County.

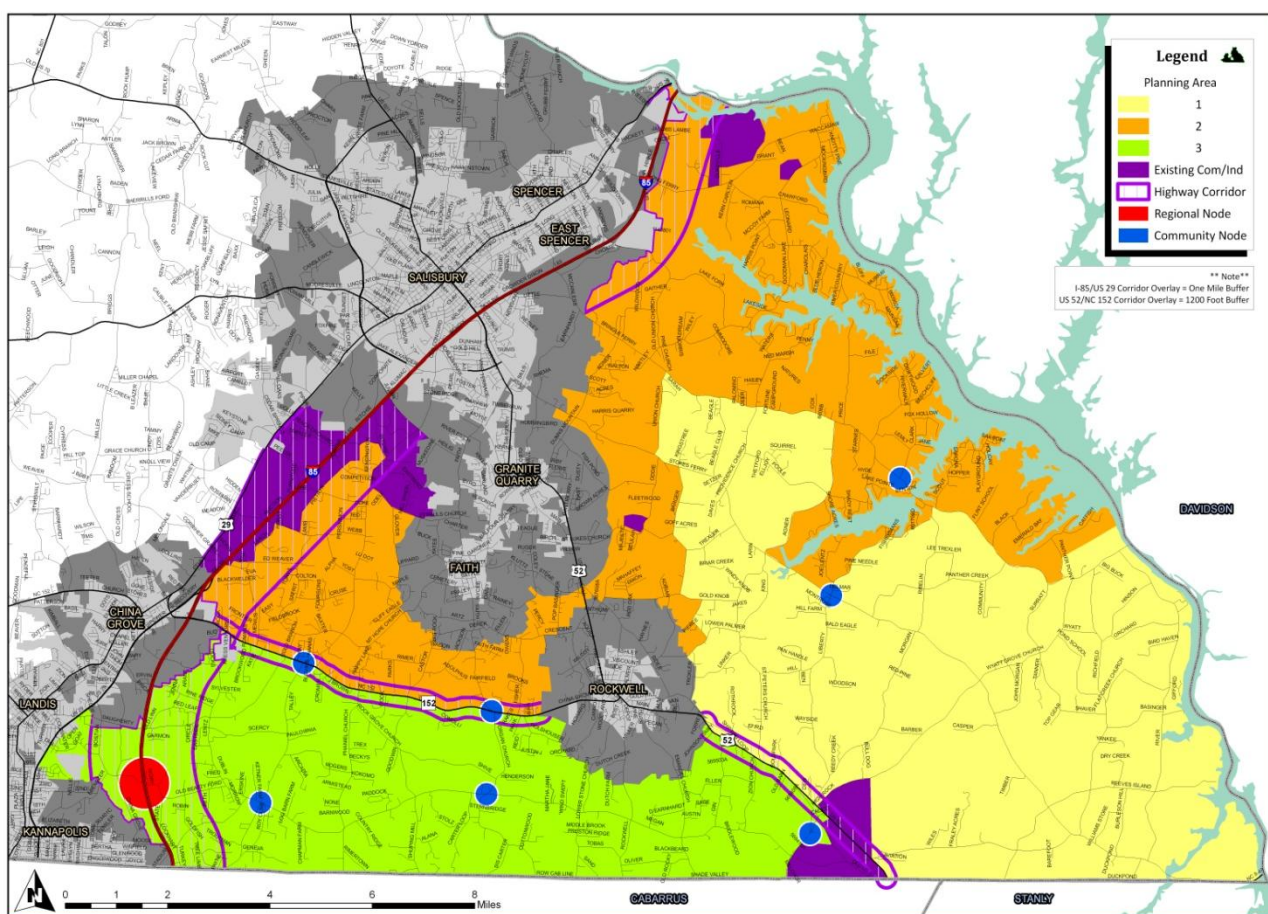


Figure 20 - Areas East of I-85 Planning Area Map

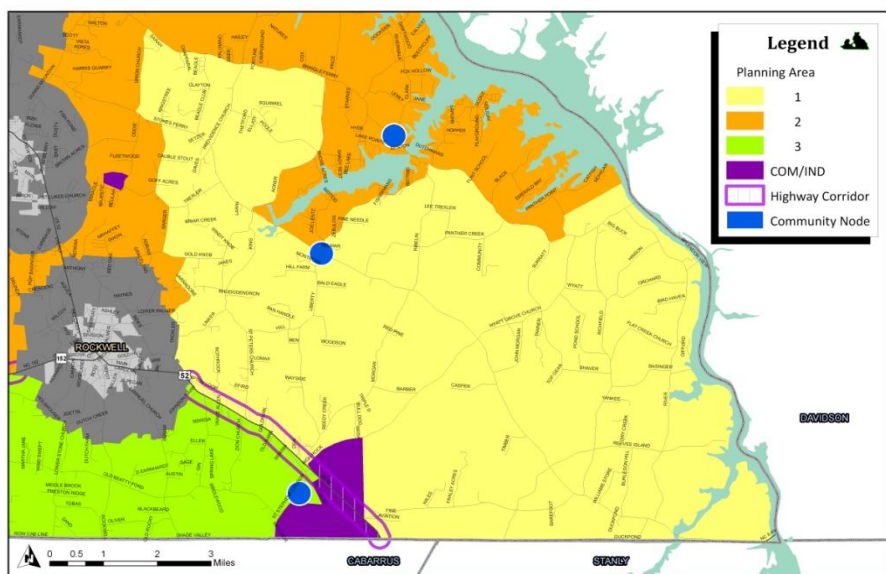


Figure 21 – Planning Area One

Area One is generally defined as the land area south of Bringle Ferry Road, east of Union Church and Barger Roads and paralleling the northeast side of US 52. The area is the least developed of the three identified Planning Areas and consists primarily of agricultural and low density residential uses serviced by private wells and septic systems. Access points to Tuckertown Reservoir provide scenic vistas and recreational opportunities in the area. Although commercial and industrial uses are limited, the

majority are located in or near the US 52 commercial and industrial corridor and the Liberty community node. There are also additional instances of existing rural commercial and industrial uses that operate along recognized thoroughfares.

Future Land Use Recommendations

- A. Due to recognized soil constraints, limited opportunities for residential development (major / minor subdivision) are available throughout the Planning Area. When opportunities exist, conservation subdivision development is considered appropriate in combination with agricultural activities such as cattle grazing, hay fields, etc (farm uses that will not create constant noise, dust or odor).
- B. Due to lower population densities, opportunities for high impact and/or rural industrial uses may be available along thoroughfares in the Planning Area where conflicts with residential uses are limited.
- C. Proposals for expansion of existing businesses that minimize conflict with surrounding residential uses through design standards or impact mitigation techniques are encouraged in the Planning Area.



Figure 22 – Planning Area One pictures

Source: Rowan County Dept. of Planning & Development, 2011

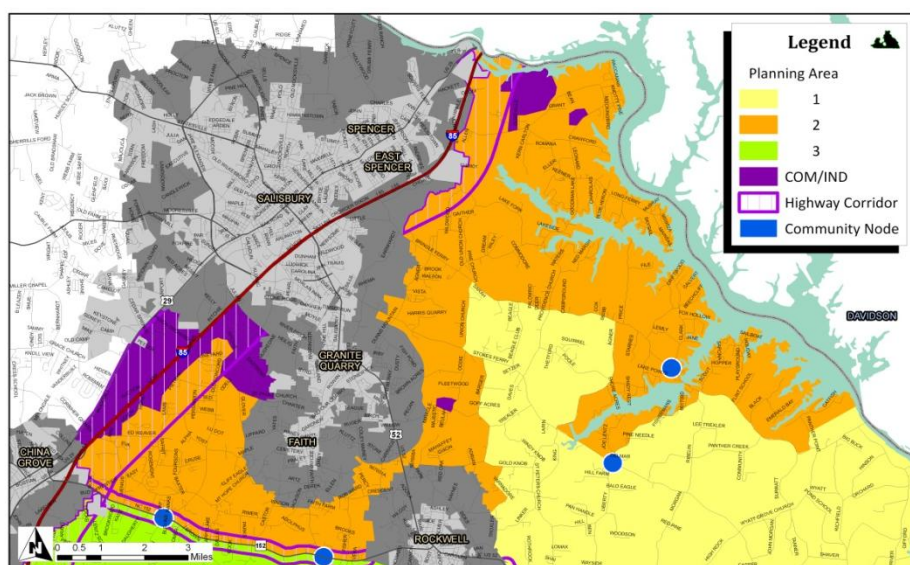


Figure 23 – Planning Area Two

Area Two is generally defined as the land adjacent to the municipalities as well as the areas surrounding High Rock Lake. The area is the most developed of the three identified Planning Areas and consists of low density residential uses and pockets of medium density residential uses serviced by private wells and septic systems, highway corridor commercial and industrial uses and some agricultural uses. Access points to High Rock Lake and Dan

Nicholas Park provide recreational opportunities in the area. Commercial and industrial uses are abundant in and near the US 29/ I-85 and NC 152 commercial and industrial corridors. Like Area One, there are also additional instances of existing rural commercial and industrial uses that operate along recognized thoroughfares.

Future Land Use Recommendations

- A. A mix of uses and service-oriented development is appropriate for the Planning Area. This may include commercial components with residential development to serve proposed and surrounding neighborhoods. Connectivity is encouraged between adjacent developments and commercial nodes through open space networks that promote walking and biking, without mandating them over private property.
- B. Industrial land use applications are discouraged in the Planning Area except for existing industrial districts and those properties within the US 29/I-85 and NC 152 highway corridor overlays.
- C. Due to suitable soil conditions and access to recognized thoroughfares, medium density residential development is encouraged in the Planning Area. When opportunities for new residential development exist, traditional and conservation subdivision designs using the current minimum lot size standards are appropriate.
- D. Proposals for expansion of existing businesses that minimize conflict with surrounding residential uses through design standards or impact mitigation techniques are encouraged in the Planning Area.
- E. The use of performance-based standards that promote compatible land development patterns are encouraged in the Planning Area when residential uses may be proposed adjacent to voluntary agricultural districts and existing or proposed industrial and/or commercial uses. The TRC should study potential impacts of noise, dust or odor before a final recommendation is made.

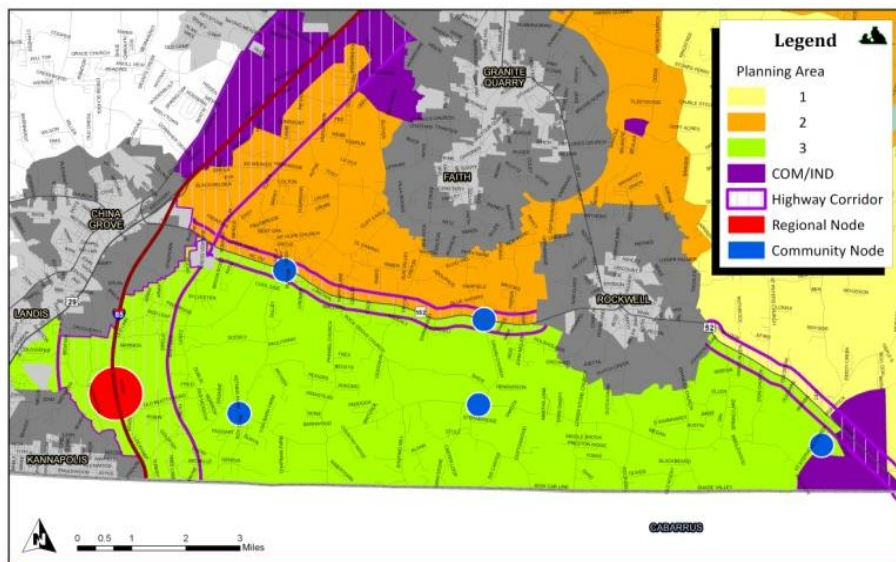


Figure 24 – Planning Area Three

Area Three is generally defined as the land area south of NC 152, east of US 29 and paralleling the west side of US 52. The area consists of a mix of agricultural uses, low density residential uses serviced by private wells and septic systems, nodal commercial uses, highway corridor commercial and industrial uses and historically significant churches and residences. Development in this area is somewhat affected by the Coldwater Creek Branch (Lake Fisher)

and Dutch Buffalo Creek water supply watersheds that limit impervious coverage for non-residential uses and require a larger residential lot size as compared to non-water supply watershed areas. Industrial uses in the US 52 commercial and industrial corridor near the Gold Hill community tend to be ‘extraction-based’ operations (i.e. Vulcan, Carolina Sta-Lite and clay pits for brick manufacturing). Timber and wood related businesses have traditionally operated in this area as well.

Future Land Use Recommendations

- A. The rural character of the area can be better preserved by promoting the clustering of smaller residential tracts, while preserving open space and/or farmland. Opportunities for conservation subdivision design may offer more efficient and flexible lot design in order to preserve rural character and is encouraged in the Planning Area for all proposed developments greater than twenty acres.
- B. A mix of uses is encouraged in or near the community nodes within the Planning Area. This may include commercial components with residential development to serve proposed and surrounding neighborhoods. Connectivity is encouraged between adjacent developments and commercial nodes through open space networks that promote walking and biking, without mandating them over private property.
- C. The use of performance-based standards that promote compatible land development patterns are encouraged in the Planning Area when residential uses may be proposed adjacent to voluntary agricultural districts, existing or proposed industrial and/or commercial uses, and county landmarks and/or *National Register of Historic Places* properties. The TRC should study potential impacts of noise, dust or odor before a final recommendation is made.
- D. Proposals for expansion of existing businesses that minimize conflict with surrounding residential uses and recognized historic properties through design standards or impact mitigation techniques are encouraged in the Planning Area.



COMMERCIAL USES

Future Land Use Recommendations

Highway Business

Businesses located on or along NC 152 East

Highway businesses are typically recognized as ‘stand-alone’ businesses. The following are land use recommendations for *Highway Businesses* in the Planning Area:

- A. Encourage setbacks and structure placement that promotes side and rear parking
- B. Consider building appearance, design elements and landscaping for new businesses
- C. Consider setbacks and buffer standards for new projects locating adjacent to existing residential uses
- D. Consider the creation of a Highway Business zoning district and associated standards to eliminate continued use of parallel conditional use districts.

Rural Business

Businesses located on or along identified thoroughfares including but not limited to, Old Concord, Stokes Ferry, Long Ferry, Bringle Ferry and Old Beatty Ford Roads

The following are land use recommendations for *Rural Businesses* in the Planning Area:

- A. The Neighborhood Business (NB) district is considered appropriate for locating new or existing businesses. The NB District may be enhanced by increasing the number of allowed uses, as well as considering a maximum building size, appearance standards and setbacks.

Home Based Business

Businesses located on the same parcel as the residence

The following are land use recommendations for *Home Based Businesses* in the Planning Area:

- A. Businesses should be sited to the rear of the home with lighting that is building mounted and focused downward. Adjoining residential uses should have visual separation provided by the business. The size of accessory structures associated with the business operation may also be limited.



Figure 25 – Examples of commercial uses in the study area
Source: Rowan County Dept. of Planning & Development, 2011



COMMERCIAL NODES

Future Land Use Recommendations

- A. Community and regional commercial nodes are to be encouraged at key intersections and recognized community crossroads in the Planning Area. Flexibility as to the location, design and development standards should exist with discretionary review by the TRC and the Planning Board.

- B. Regional nodes should be defined and limited to major intersections along I-85. The potential for a regional node in the Planning Area exists with the construction of a new interchange at Old Beatty Ford Road and I-85. Mixed land use types are encouraged in the regional node in order to reduce reliance on municipal

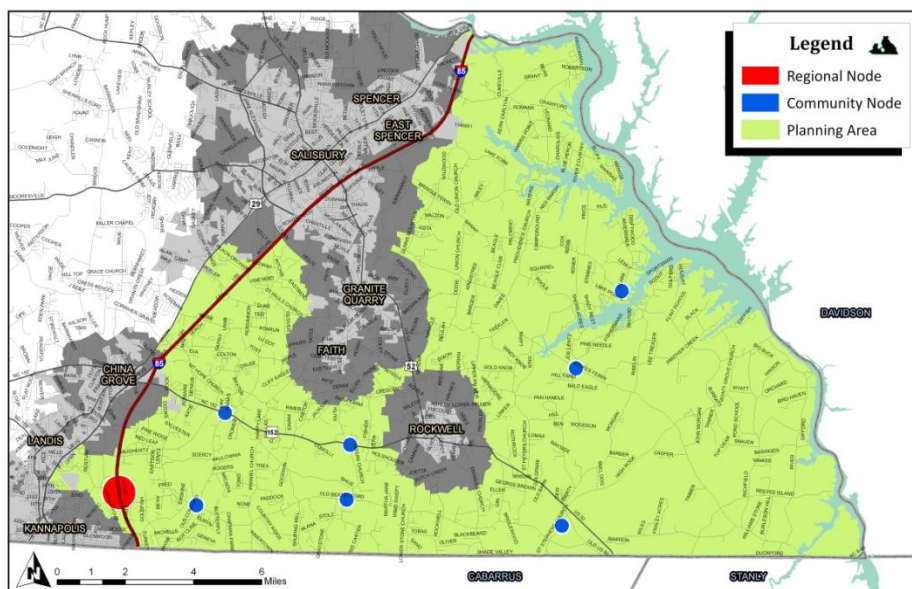


Figure 26 – Community and Regional Nodes

- service centers. Examples of land use types in a regional node include but are not limited to, shopping complexes, grocery stores, convenience goods, gas stations, office complexes, restaurants and health care services.

- C. Community nodes in the Planning Area include:
- Bostian Heights
 - Intersection of Old Beatty Ford Road and Old Concord Road
 - Sifford's (Intersection of Faith Road and NC 152)
 - Intersection of Organ Church Road and Old Beatty Ford Road
 - Gold Hill Village
 - Liberty
 - Tamarac Marina
- D. Permitted commercial uses that support the existing populations' need for retail goods and services are encouraged in the community nodes. Examples include but are not limited to, convenience stores, gas stations, office space, restaurants and retail/service businesses.
- E. To encourage future nodal development and access management practices in the Planning Area, 'Strip' commercial development not within a community node, regional node or adjacent to a major intersection should require a conditional use permit.



COMMERCIAL AND INDUSTRIAL CORRIDORS

Significant public investment and infrastructure is in place along I-85, US 29 and portions of US 52. The following land use patterns are recommended within these corridors of the Planning Area.

Future Land Use Recommendations

I-85 and US 29

- A. Commercial and industrial uses, as well as mixed use development are encouraged within the I-85, US 29 corridor of the Planning Area. This includes:
 - i. The adaptive reuse or redevelopment of existing structures or sites that are complementary to the corridor. Infill commercial and aggregating smaller tracts for development is preferred.
 - ii. Heavy impact uses that are complimentary to the rail corridor paralleling I-85 and US 29 that do not compromise existing businesses or residential uses may be appropriate for consideration. Heavy impact uses should utilize existing highway, rail and utility infrastructure.
 - iii. The corridor area between Salisbury and China Grove may be appropriate for light manufacturing, advanced manufacturing, distribution, bio-technology industries and motor sports industries. It may also be the ideal location for corporate headquarters that require frontage, acreage and/or visibility from I-85.
- B. Consider the size, scale and density of new projects for requiring connection to existing public utilities. The use or extension of existing and planned water and sewer utilities is encouraged.
- C. Perimeter landscaping and parking on sides and rear of buildings is suggested.

US 52

- A. Commercial and industrial uses having need for rail and US Highway availability are encouraged within the US 52 corridor of the Planning Area. This includes:
 - i. Heavy impact uses that are complimentary to the rail corridor paralleling US 52 that do not compromise existing businesses or residential uses may be appropriate for consideration. Heavy impact uses should utilize existing highway, rail and utility infrastructure.
- B. Quality building design and appearance, as well as connectivity between adjacent undeveloped tracts as development occurs is encouraged.
- C. Consideration of new residential developments (major subdivisions) should be a function of the Planning Board or require a conditional use permit due to the potential conflicts with heavy impact uses.

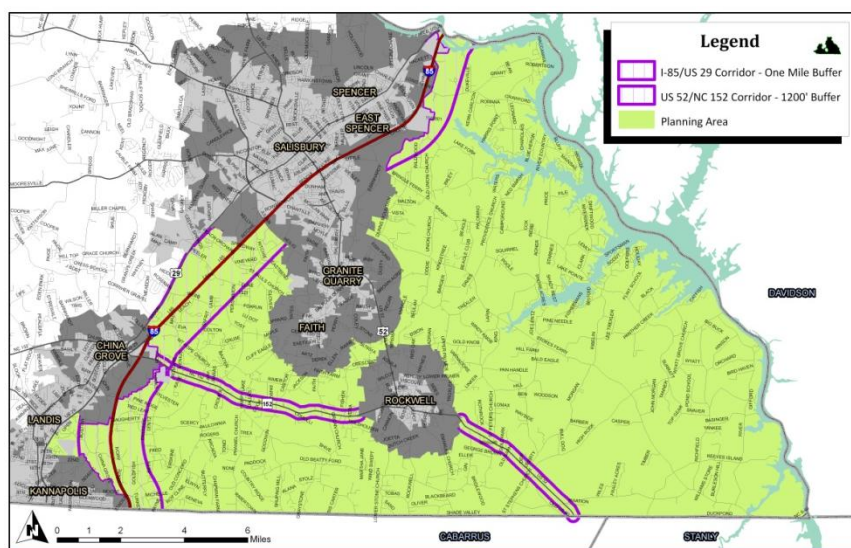


Figure 27 – Commercial and Industrial Corridors



RESIDENTIAL USES

Future Land Use Recommendations

Major Subdivision Development

Improve upon the current major subdivision approval process in order to accommodate development while preserving the character of the study area

- A. Enhance the existing Technical Review Committee (TRC) for major subdivision review
 - a. Currently includes representatives from Erosion Control, Environmental Health, North Carolina Department of Transportation and the Fire Marshall
 - b. Define proper roles for additional members, who may include:
 - i. Representatives from Rowan-Salisbury Schools, Emergency Medical Services, Soil and Water Conservation District and municipal planning staff if a major subdivision is within one mile of the municipal planning and zoning boundary
- B. Require informal sketch plans for all major residential development (traditional & conservation)
- C. Require the applicant/developer to meet with the TRC, Staff and the Planning Board to discuss the assets and constraints of the development site and possible issues before a sketch plan may be submitted
 - a. Based on objective criteria a resource analysis assessment or impact study detailing the sites natural (soils, trees, wildlife) and historic resources should be required and discussed at the preliminary meeting
 - b. Site-visits should be encouraged
- D. Major subdivisions that generate a minimum of one-thousand daily trips (as defined in the *ITE Trip Generation Manual*) should have direct access to a recognized thoroughfare and a minimum of two points of entry
- E. Developments with one-hundred or more lots should be encouraged to use a multi-connection water system and common septic systems
- F. Provide lot number threshold levels similar to the current utility extension policy in the subdivision ordinance for requiring soil evaluations, testing of groundwater aquifers, traffic impact studies and Planning Board approval

Conservation Subdivision Design

Provide option for conservation subdivision design to prevent the loss of rural character (see Figure 28 below)

- A. Reduce the minimum lot size for subdivisions that protect the character of the landscape by preserving useable common open space
 - a. Lot sizes in conservation developments should be a minimum acreage with individual well and septic system, or a reduction in minimum acreage with a shared water system and/or common septic systems
 - i. Areas of the open space maintained by a Homeowners Association (HOA) can be used for potential septic drain fields
 - b. Minimize the clearing of vegetation and preserve important natural features
 - c. Retain stone walls, hedgerows and other rural landscape elements
 - d. Avoid construction in open fields
 - i. Primary conservation areas should preserve existing farmland and areas with soils suitable for agriculture



- e. Locate structures and septic systems more than one-hundred feet from streams or ponds to protect water quality
- B. Floodplains, steep slopes, street and utility right-of-ways and wetlands indicated during the preliminary review stage should not be included as a density credit
- C. Open space may be secured by creating a conservation easement and maintaining open space through a Homeowners' Association or an agreement with a conservation organization (i.e. Land Trust)
 - a. Common uses for protected open space include:
 - i. Agriculture and community gardens
 - ii. Pastures, meadows and wildlife habitat preservation
 - iii. Recreational fields and trails
 - iv. Visual or sound barriers
 - v. Forest management

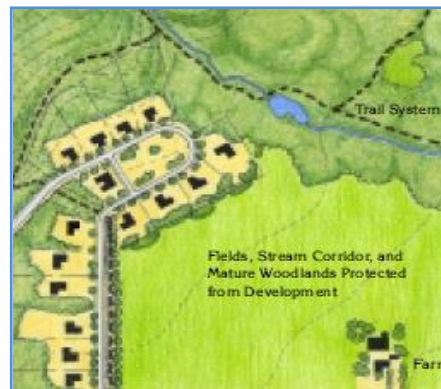


Figure 28 - Traditional Subdivision Layout v. Conservation Subdivision Layout
Source: Randall Arendt, 1996

RURAL AREAS

Rowan County's rural heritage and agricultural land uses are prevalent throughout the County as evidenced in Historic Places & Agriculture Maps. Aside from typical zoning and land use regulations to assist in preservation of this land use, many non-traditional ideas or policies may be worthy of consideration to assist landowners.

Future Land Use Recommendations

- A. Promote and expand the voluntary agricultural district program to help minimize incompatible land uses next to existing farm operations
 - a. Increase awareness of voluntary agriculture districts in order to expand its application
 - i. The purpose of the Agricultural District Program is to encourage the preservation and protection of farmland from non-agricultural development. This is in recognition of the importance of agriculture to the economic and social well being of North Carolina and Rowan County
 - ii. Members of the Agricultural District agree to not develop for a period of at least ten years (this is a voluntary requirement of the Voluntary Agricultural District and a mandatory requirement of the Enhanced Voluntary Agricultural District)



- iii. In exchange for remaining in farming, Agricultural District members receive:
 - 1. Signs identifying them as a member
 - 2. Increased protection from nuisance suits
 - 3. Waiver of water and sewer assessments
 - 4. Required public hearings for proposed condemnation
 - 5. Eligibility from available funding sources and an advisory role in county government
 - b. Establish use of current Agricultural District overlay on existing farms
- B. Encourage agri-business and natural resource related industries
- a. Promote buy local programs through the NC Cooperative Extension and other organizations
 - b. Identify 'new industries' for potential matches in agri-business
 - i. Organic certified products/markets continue to do well
 - ii. Alternative fuel production is an emerging market
 - iii. Biotech spin-off industries related to the NC Research Campus in Kannapolis

NATURAL ENVIRONMENT

Although the committee offers one recommendation under the natural environment category, many of the residential land use recommendations include suggestions and considerations that will improve and help preserve the natural environment and water quality/ quantity if implemented. Therefore, they were not repeated in this section.

Future Land Use Recommendations

- A. Consider the establishment of a one-hundred foot minimum stream buffer for all new development in watershed protection areas and a minimum fifty foot buffer for all new development outside of watershed protection areas. This would help protect riparian buffers for enhanced stream and water quality; provide aquifer recharging instead of water rushing out of streams in the study area to other areas; provide a higher water quality with filtration before reaching the groundwater supply, decrease erosion along stream banks; and protect wildlife habitats.

PRIVATE PROPERTY RIGHTS

Future Land Use Recommendations

Committee A favors maintaining the private property rights recommendations contained in the Western Area Land Use Plan which state that an ordinance should be passed to make it clear that no access to privately owned real property is granted by government to any agency or employee who lacks either permission from the landowner or court-issued authorization, except in the event of exigent circumstances (for access by police, fire or other emergency personnel) and that no public trails should be proposed across private lands, or farmlands, unless the property owner voluntarily consents to them.



FUTURE STUDIES AND PLANS

In addition to the studies and plans recognized in the Western Area Land Use Plan, Committee A also recommends consideration of future studies and plans described below.

- A. As continued growth and development of the North Carolina Research Campus occurs, the location of a new interchange and availability of undeveloped acreage provides distinct economic development opportunities in the planning area. Therefore it is recommended that a detailed study be conducted of the recognized opportunity for location of a regional node at I-85 and Old Beatty Ford Road, as well as monitor subdivision requests and thoroughly review plans with all transportation agencies for projects in and around the regional node.
- B. It is also recommended that a detailed study be conducted of the I-85 corridor that evaluates recent and planned infrastructure projects (transportation, water & sewer) in combination with economic development sites marketed by the Rowan-Salisbury Economic Development Commission. Corridor recommendations may include new or amended zoning designations as a result of the study.
- C. A more detailed study and plan for the High Rock Lake area may be warranted to accommodate or determine the appropriate retail and service businesses for the increasing population and recreation opportunities afforded by the lake.



NEXT STEPS

Implementation Strategies

Following the adoption of this plan, it should be utilized as a guide for future land use decisions in the eastern area of the county. This plan will:

- A. Function as a “guide” for future decision making. It is not an official set of rules regulating land use.
 - a. For example, zoning and subdivision regulations are considered implementation tools of a land use plan.
- B. Be flexible and may be amended as new land use trends arise.
- C. Assist the county in determining where new facilities and services are needed, such as schools and new EMS locations.
- D. Help the county become more competitive for already limited federal and state grant funding for public investment projects.

Conclusions

This plan is intended to be a ‘road map’ or ‘guide’ for future land use decisions and should be referenced by the Planning Board and County Commissioners when reviewing rezonings, site plans and other land use related issues and requests. The plan should be considered a ‘living’ document and reviewed on a regular basis to ensure it is continuing to meet the needs of the eastern area of Rowan County. An update should be completed in five years with a thorough update in ten years.

Significant work has been devoted to the creation of this plan by the citizens of east Rowan, Committee A and Planning Staff and much devotion and dedication lies ahead as the county grows and considers future land use patterns, fiscal implications and environmental impacts of future land use decisions in the areas east of I-85.



APPENDIX A – Additional Information

A.1 – Population Data 1970 – 2030
Source: US Census Bureau, NC State Demographers Office, 2011

Location	1970	1980	Δ 70 - 80	% Δ 70 - 80	1990	Δ 80 - 90	% Δ 80 - 90	2000	Δ 90 - 00	% Δ 90 - 00
Cabarrus	74,629	85,895	11,266	15%	98,935	13,040	15%	131,063	32,128	32%
Davidson	95,627	113,162	17,535	18%	126,677	13,515	12%	147,250	20,573	16%
Davie	18,855	24,599	5,744	30%	27,895	3,296	13%	34,835	6,940	25%
Iredell	72,197	82,538	10,341	14%	92,935	10,397	13%	122,660	29,725	32%
Mecklenburg	354,656	404,270	49,614	14%	511,481	107,211	27%	695,370	183,889	36%
Montgomery	19,267	22,469	3,202	17%	23,352	883	4%	26,837	3,485	15%
Rowan	90,035	99,186	9,151	10%	110,605	11,419	12%	130,340	19,735	18%
Stanly	42,822	48,517	5,695	13%	51,765	3,248	7%	58,100	6,335	12%
N. Carolina	5,084,411	5,880,095	795,684	16%	6,632,448	752,353	13%	8,046,813	1,414,365	21%
U.S.A	203,302,031	226,545,805	23,243,774	11%	248,709,873	22,164,068	10%	281,421,906	32,712,033	13%

Location	2010	Δ 00 - 10	% Δ 00 - 10	2020	Est. Δ 10 - 20	% Est. Δ 10 - 20	2030	Est. Δ 20 - 30	% Est. Δ 20 - 30
Cabarrus	178,011	46,948	36%	219,629	41,618	19%	260,235	40,606	16%
Davidson	162,878	15,628	11%	183,671	20,793	11%	204,022	20,351	10%
Davie	41,240	6,405	18%	46,893	5,653	12%	52,411	5,518	11%
Iredell	159,437	36,777	30%	186,868	27,431	15%	213,631	26,763	13%
Mecklenburg	919,628	224,258	32%	1,097,084	177,456	16%	1,270,222	173,138	14%
Montgomery	27,798	961	4%	30,256	2,458	8%	32,159	1,903	6%
Rowan	138,428	8,088	6%	147,491	9,063	6%	156,331	8,840	6%
Stanly	60,585	2,485	4%	64,986	4,401	7%	69,284	4,298	6%
N. Carolina	9,535,483	1,488,670	19%	11,062,090	1,526,607	14%	12,491,837	1,429,747	11%
U.S.A	308,745,538	27,323,632	10%	341,387,000	32,641,462	11%	373,504,000	32,117,000	9%



A.2 – Housing Unit Data 1970 – 2010

Source: US Census Bureau, 2011

Location	1970	1980	1990	2000	2010
<i>Cabarrus County Total HU</i>	24,436	32,468	39,713	52,848	72,150
Manufactured Homes	960	2,833	5,350	6,544	5,279
% Manufactured	4%	9%	13%	12%	7%
<i>Davidson County Total HU</i>	30,931	44,285	53,266	62,432	72,638
Manufactured Homes	2,062	4,948	9,230	11,068	11,456
% Manufactured	7%	11%	17%	18%	16%
<i>Davie County Total HU</i>	6,190	9,477	11,496	14,953	
Manufactured Homes	592	1,239	2,176	3,535	
% Manufactured	10%	13%	19%	24%	
<i>Iredell County Total HU</i>	23,867	32,361	39,191	51,918	69,106
Manufactured Homes	1,506	3,176	7,512	9,275	10,492
% Manufactured	6%	10%	19%	18%	15%
<i>Mecklenburg County Total HU</i>	114,974	156,134	216,416	292,780	399,171
Manufactured Homes	3,762	4,123	5,741	6,145	6,737
% Manufactured	3%	3%	3%	2%	2%
<i>Montgomery County Total HU</i>	6,888	9,520	10,421	14,145	
Manufactured Homes	404	1,139	2,121	3,998	
% Manufactured	6%	12%	20%	28%	
<i>Rowan County Total HU</i>	29,796	39,049	46,264	53,980	60,239
Manufactured Homes	1,957	4,499	8,379	11,137	12,168
% Manufactured	7%	12%	18%	21%	20%
<i>Stanly County Total HU</i>	15,139	19,185	21,808	24,582	
Manufactured Homes	684	1,145	3,008	4,192	
% Manufactured	5%	6%	14%	17%	
<i>North Carolina Total HU</i>	1,641,222	2,274,737	2,818,193	3,523,944	4,333,479
Manufactured Homes	98,474	221,827	421,464	577,323	606,801
% Manufactured	6%	10%	15%	16%	14%
<i>United States Total HU</i>	68,704,315	88,410,627	102,263,678	115,904,641	131,191,065
Manufactured Homes	2,072,887	4,663,457	7,324,154	8,779,228	8,636,728
% Manufactured	3%	5%	7%	8%	7%



A.3 – School Capacity Data
Source: Rowan-Salisbury Schools, 2011

School	2010-2011 Enrollment	2011-2012 (10 Day Enrollment)	Capacity (Not including Mobiles)	% Capacity (2011-12)
High Schools				
East Rowan	1,067	1,074	1,341	80.09
Jesse Carson	1,140	1,177	1,153	102.08
North Rowan	616	691	1,102	62.70
Salisbury	844	875	1,169	74.85
South Rowan	921	1,008	1,375	73.31
Middle Schools				
China Grove	601	598	625	95.68
Corriher-Lipe	536	518	634	81.70
Erwin	969	960	984	97.56
North Rowan	525	526	810	64.94
Southeast	744	776	869	89.30
Elementary Schools				
Bostian	321	345	316	109.18
China Grove	585	538	781	68.89
Elizabeth Koontz	552	570	616	92.53
Ethan Shive	489	477	595	80.17
Faith	427	441	442	99.77
Granite Quarry	542	503	602	83.55
Hanford Dole	459	470	665	70.68
Knollwood	634	638	660	96.67
Landis	550	542	664	81.63
Morgan	392	374	378	98.94
Rockwell	484	476	693	68.69



APPENDIX B – Public Input

Website/Email Comments

- A proposed land use plan is an important tool for orderly development in Rowan County. It must work in conjunction with the guidelines within the existing Rowan County Zoning Ordinance which was adopted to promote the health, safety and general welfare of the public. These guidelines provide for economic, social, and aesthetic advantages resulting from the orderly planned use of land resources. When the existing guidelines within the Ordinance or a land use plan are not followed, normal growth and development may be inhibited. Rowan County Staff must examine its past practices which has affected the growth rate in east Rowan County. In the past ten years, we have experienced the following on our road:
 - Spot zoning of an Industrial site in close proximity to residential property has been practiced in Gold Hill.
 - A building application for a warehouse was approved without a site plan or zoning change.
 - Proper buffer requirements have been disregarded by Planning Staff, Planning Board and Board of Commissioners when approving a zoning change.
 - All of these practices have a negative effect on residential development.
- In order for a Land Use Plan to have value, it must be followed. The existing Rowan County Zoning Ordinance should be used to protect property rights.
- Highway Corridor Overlay on the eastern side of I-85 from the Webb Road (Market Area) south to Pine Ridge Rd area does not seem necessary. Most of those properties are developed for residential with the exception of the industrial land that is already zoned as industrial around Hitachi. Encouraging more industrial and commercial next to these existing residential developments would be troublesome for the many residents that live along that portion of the corridor. The corridor overlay is most appropriate for western side of I-85 and 29 where there is more available infrastructure, rail, four lane road facilities, vacant industrial buildings, access to the interstate and airport, and existing commercial and industrial uses, etc.
- A regional park, passive and/or active, designated somewhere along the eastern side of I-85 in the corridor area would help serve recreational needs of residents in the general southeastern portion of the county and potentially act as a buffer from industrial uses that are existing or proposed. A significant amount of land is located off of Mt. Hope Church Road near I-85 and where a major road is planned near Menius Road.
- The Highway Corridor Overlay for Highway 152 East should be re-evaluated. The road facility cannot support the traffic generated by linear “strip” type development and will most likely not be widened for the next 15 to 20 years. Development and future commercial rezoning should be focused at the nodes over the next 10 to 20 years, not haphazardly along the highway where significant residential development exists. The existing and scattered commercial/industrial areas work well; however, further concentrations spread out along the road will encourage an increase in curb cuts and sudden stops that will most likely result in more traffic issues, especially during peak hours and the high school.
- More protection needed to ensure adequate buffers are in place and/or provided between established residential areas and any commercial or industrial development. Ordinances need more defined criteria to ensure residential property owners are protected against the potentially harmful noise, dust, odor and traffic that can be associated with many industrial and commercial properties.
- NC 152 from the school to China Grove needs pedestrian/bicycle facilities. The road is more than wide enough to accommodate bicycle lands on both sides. Maybe this would be a good area for a shared



use path? It would be a great opportunity for the school to have more of its students walking or biking reducing vehicular trips.

- Also, lots of cyclists and pedestrians in general use this road as well. I would get out and use it more. I have several neighbors that bike it now and my wife runs on a small portion of it to get to the high school to run back there.
- I think the entire NC 152 could use a shared path for bicycles and pedestrians, with the stretch from the high school into China Grove as a priority. With the width of the roadway being what it is, I don't think it would be too difficult to fit in something like this at a fairly low cost. The County and Town could probably even obtain some safe routes to school or other monies to help.
- I wanted to let you know about a house in the east study area that is dated to the early 1800's. The address is 3010 Sides Road. It is not in the David Ford Hood book. I was present about 10 years ago when he came out and dated the house. I remember that he said it was a good candidate for historical registration, but the owners never pursued that avenue, as far as I know.

Comments from East Rowan High School (September 20, 2011)

- Please look at expanding water/sewer through intersection of Stokes Ferry Road and Dunn's Mountain Road. Family owns 48 acres of prime property here and it could be a good location for residential/apartments or even industry.
- How to get cable TV and high speed internet at 486 John Morgan Road, Gold Hill 28071.

Comments from North Rowan High School (September 22, 2011) **

- Farm use is not a "gentle" use of land. Forests are removed, soil is tilled (creating sedimentation that migrates to the Yadkin and its tributaries), and phosphate run-off from fertilizers create algae that alters the water's natural oxygen balance. So I would propose that with proper vegetation buffering, at least light industrial uses should be allowed in the same zoned areas as "agricultural" use. Industrial uses provide more jobs per acre, contribute exponentially more to our local tax base, and with proper buffering requirements, could be more environmentally friendly, too.
- The committee should ask commissioners to seek State legislation to eliminate ETJ's altogether. The justification was forced annexation for the last five decades. Now that forced annexation has received a proper burial, zoning should be a simple "jurisdictional" issue in the very purest sense. If it's within a municipality's boundaries, they can retain jurisdiction. If it is not within a municipality's boundaries, the county should regain jurisdiction. Existing zoning could remain in place, but the owners of property in the former ETJ would approach COUNTY, rather than MUNICIPAL officials, for zoning changes, CUP's, SUP's, variances, etc.

Comments from Jesse Carson High School (September 27, 2011)

- Cities no longer need to control our land use outside of their boundaries
- Leave landowners the ---- alone... we don't want government control.
- If municipal expansion created "Economies of scale," Charlotte would have the lowest tax rate on the East Coast.
- Protect private landowners from the encroaching tentacles of the City of Salisbury.
- Do not permit public access trails to be constructed across our private land, this includes greenways thread trails & any other government scheme or artifice designed to open MY land to public access.



-
- Our county commission needs to oppose ANY legislation that would permit Salisbury to inject treated waste water into our underground aquifers.
 - Transportation funds paid from our gasoline tax should go to improve our deteriorating roads and bridges ONLY!!!
 - Our county commission should oppose legislation that would permit power bill transportation funds to be diverted to recreational use for walking and bike paths.
 - Eliminate extra-territorial jurisdiction since forced annexation is dead.
 - Well thought out and presented clearly.

*** The workshop at North Rowan High School was abbreviated due to issues with the school's fire alarm system. Comments were received via email from would-be participants.*